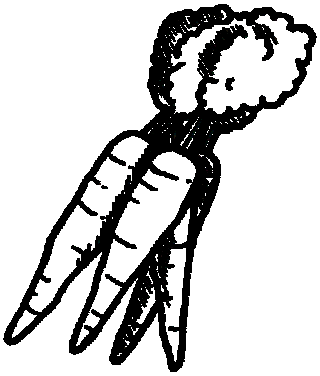
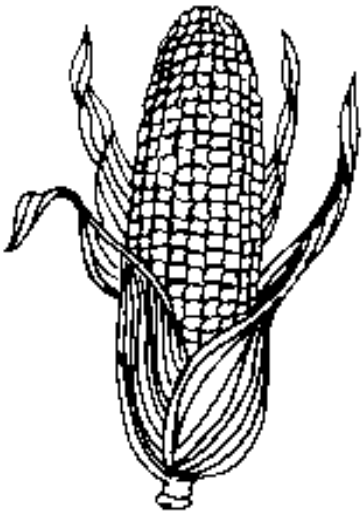
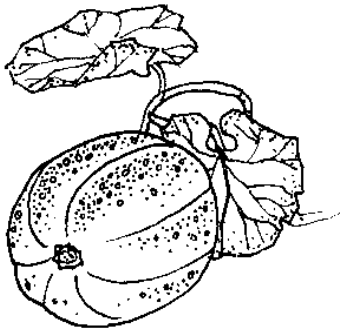
Horticulture and Crop Science
Series No. 731

WEED MANAGEMENT in VEGETABLE CROPS

RESEARCH RESULTS 2002

Douglas J. Doohan
Joel Felix
Tim Koch

Department of Horticulture and Crop Science
The Ohio State University
Ohio Agricultural Research and Development Center
Ohio State Extension

This report contains the results of field plot research on vegetable weed management in Ohio for the summer 2002. This report and other resources are available on the Internet at: **www.oardc.ohio-state.edu/weedworkshop**

This bulletin does not constitute endorsement or specific recommendations. Apology is expressed for any inadvertent errors found in this report.

Final copies of commercial advertisement that will contain data from these results are subject to the author's approval before publication.

01/27/2002-H-484(120)

TABLE OF CONTENTS

ACKNOWLEDGEMENTS

Special acknowledgement and thanks are due to the following individuals who made this work a success:

Experiment Stations

Richard L. Callendar and Farm Crew - Muck Crops Branch, Willard
Matt Hofelich and Farm Crew - Vegetable Crops Branch, Fremont
John Y. Elliot - Dept. Farm Manager and Staff, OARDC/OSU
Lynn F. Ault - Farm Manager, OARDC/OSU
Paul McMillen, Brian Sugerman, and Cathy Herms – OARDC/OSU

Research Assistant

Timothy A. Koch

Graduate Research Student

Rodrigo Figueroa
Karen Amisi

Summer Student Assistants

Josh Reinford
Noah Myers
Rachel Baker
Chelsea Hunt

Special acknowledgements and thanks are due to the following for their support of the Vegetable Weed Research Program, Department of Horticulture and Crop Science, OARDC/The Ohio State University.

Aventis CropScience

BASF Ag Products

Bayer Crop Protection

Dow AgroSciences

E.I. duPont de Nemours & Co., Inc.

FMC Corporation

Gowan Company

Griffin LLC

Helena Chemical Company

Monsanto Company

Ohio Fruit & Vegetable Growers Assoc.

Ohio Fruit Growers Assoc.

Rispens Seeds, Inc.

Rupp Seeds, Inc.

Syngenta Crop Protection, Inc.

Syngenta Seeds, Inc.

United Agri-Products Co.

A PARTIAL LIST OF CROP BAYER CODES USED IN THIS REPORT:

ALLCE = Dry bulb and green onion
BRSOL = Cabbage
CPSAN = Bell pepper
CUUPE = Pumpkin
CUMSA = Cucumber
DAUCS = Carrot
LACSA = Lettuce
LYPES = Tomato
PHSVN = Snap bean
SOLTU = Potato
ZEAMS = Sweet corn

A PARTIAL LIST OF RATING CODES USED IN THIS REPORT:

BUGGY WHIP = Buggy whipping
CHLOROSIS = Yellow color, bleaching
CONTROL = Weed efficacy
DEFOLIAT = Defoliation
INJURY = Composite assessment of stunting, chlorosis, and other visible effects
LBS/PLOT = Pounds per plot
MAR BURN = Marginal burn
MKTB. NO. = Marketable number
MKTB. YIELD = Marketable yield
STUNT = Reduction in height or growth
TWIST = Leaf and/or stem curl
UNMKTB. NO. = Unmarketable number
UNMKTB. YLD. = Unmarketable yield

A LIST OF WEEDS WITH BAYER CODES USED IN THIS REPORT:

BAYER CODE	COMMON NAME	BOTANICAL NAME
ABUTH	velvetleaf	*Abutilon theophrasti* Medicus
AGRASS*	foxtail, crabgrass spp.	*Setaria, Digitaria* spp.
AGGRE	quackgrass	*Elytrigia repens* (L.) Nevski
AMABL	prostrate pigweed	*Amaranthus blitoides* S. Wats.
AMARE	redroot pigweed	*Amaranthus retroflexus*
AMAXX*	pigweed spp.	*Amaranthus* spp.
AMBEL	common ragweed	*Ambrosia artemisiifolia* L.
AMBTR	giant ragweed	*Ambrosia trifida* L.
APCCA	hemp dogbane	*Apocynum cannabinum* L.
CAPBP	sheperd's-purse	*Capsella bursa-pastoris* (L.) Medicus
CHEAL	common lambsquarters	*Chenopodium album* L.
CIRAR	Canada thistle	*Cirsium arvense* (L.) Scop.
CYPES	yellow nutsedge	*Cyperus esculentes* L.
DIGSA	large crabgrass	*Digitaria sanguinalis* (L.) Scop.
MUHSC	nimblewill	*Muhlenbergia schreberi* J.F. Gmel
OXAST	yellow woodsorrel	*Oxalis stricta* L.
PANDI	fall panicum	*Panicum dichotomiflorum* Michx.
PHTAM	common pokeweed	*Phytolacca americana* L.
POLPY	Pennsylvania smartweed	*Polygonum pensylvanicum* L.
POROL	common purslane	*Portulaca oleracea* L.
SETFA	giant foxtail	*Setaria faberi* Herrm.
SOLPT	Eastern black nightshade	*Solanum ptycanthum Dun.*
TAROF	dandelion	*Taraxacum officinale* Weber
THLAR	field pennycress	*Thlaspi arvense* L.
TRFRE	white clover	*Trifolium repens* L.

* Not an official Bayer Code.

CHEMICAL LIST

TRADE NAME	COMMON NAME	FORMULATION	MANUFACTURER
A12854	acetamide	3.9SE	SYNGENTA
A12909	acetamide	3.7SE	SYNGENTA
AATREX	atrazine	4L	NOVARTIS
ACCENT	nicosulfuron	75DF	DuPont
AEF 13060 02	sulfonylurea	61WG	AVENTIS
AIM	carfentrazone	40DF	FMC
ALANAP	naptalan	2L	UNIROYAL
AUTHORITY	sulfentrazone	75WG	DuPont
BALANCE PRO	isoxflutole	4SC	AVENTIS
BAS 4552 1H	pendimethalin	3.8SL	BASF
BASAGRAN	bentazon	4SL	BASF
CALLISTO	mesotrione	4.0SC	SYNGENTA
COMMAND	clomazone	ME	FMC
DEFINE	flufenacet	6 DF	AVENTIS
DISTINCT	55% dicamba + 21.4% diflufenzopyr	76. DF	BASF
DUAL	s-metolachlor	7.6 L	NOVARTIS
DUAL II MAGNUM	s-metolachlor + safener	7. EC	NOVARTIS
GOAL 2XL	oxyfluoren	SL	ROHM and HAAS
GUARDSMAN-MAX	24.8% dimethenamid + 28.4% atrazine	5. L	BASF
MATRIX	rimsulfuron	25DF	DuPont
OPTION	foramsulfuron	35WDG	AVENTIS
OUTLOOK	dimethenamid	6L	BASF
PERMIT	halosulfuron	75DF	MONSANTO
POAST	sethoxydim	1.5L	BASF
PRINCEP	simazine	4.L	NOVARTIS
PROWL	pendimethalin	3.3 EC	BASF
SANDEA	halosulfuron	75DF	MONSANTO
SENCOR	metribuzin	75DF	BAYER
STARANE	fluroxy 1-methylheptyl ester	1.5L	Dow AgroSciences
STINGER	clopyralid	3L	Dow AgroSciences
STRATEGY	18.2% ethafluralin + 5.6% clomazone	2.1EC	PLATTE CHEM. CO.
TREFLAN	Triflualin	4L	Dow AgroSciences

ADJUVANT LIST

TRADE NAME	ABBREVIATION	DESCRIPTION
Ammonium Sulfate	AMS	Spray grade fertilizer
Crop Oil Concentrate	COC	Paraffin base petroleum oil
28 percent nitrogen	UAN	Urea ammonia nitrate soln.
Induce	NIS	Non-ionic surfactant
	MSO	Methylated seed oil

Daily Weather Summary for 4/1/2001 to 8/31/2001 at OARDC - Vegetable Crops Research Branch, Fremont, OH.
Sandusky County, Latitude: 41° 21' N; Longitude: 83° 07' W; Elevation: 636 ft.

APRIL				MAY				JUNE				JULY				AUGUST			
Date	Precip. (in)	Min. Temp. °F	Max. Temp. °F	Date	Precip. (in)	Min. Temp. °F	Max. Temp. °F	Date	Precip. (in)	Min. Temp. °F	Max. Temp. °F	Date	Precip. (in)	Min. Temp. °F	Max. Temp. °F	Date	Precip. (in)	Min. Temp. °F	Max. Temp. °F
4/1/01	0.04	33	46	5/1/01	0.00	49	81	6/1/01	0.08	49	69	7/1/01	0.00	70	90	8/1/01	0.00	59	86
4/2/01	0.00	26	44	5/2/01	0.00	57	84	6/2/01	0.06	49	63	7/2/01	0.09	48	80	8/2/01	0.00	63	92
4/3/01	0.24	31	56	5/3/01	0.00	59	85	6/3/01	0.37	48	69	7/3/01	0.00	51	70	8/3/01	0.24	63	92
4/4/01	0.00	26	47	5/4/01	0.00	57	87	6/4/01	0.00	42	61	7/4/01	0.10	55	76	8/4/01	0.04	60	84
4/5/01	0.00	29	53	5/5/01	0.00	35	86	6/5/01	0.01	53	65	7/5/01	0.10	59	83	8/5/01	0.00	57	85
4/6/01	1.36	35	65	5/6/01	0.00	34	64	6/6/01	0.24	50	66	7/6/01	0.00	45	78	8/6/01	0.00	54	85
4/7/01	0.00	34	72	5/7/01	0.00	55	70	6/7/01	0.42	49	60	7/7/01	0.00	53	79	8/7/01	0.00	59	93
4/8/01	0.12	54	81	5/8/01	0.28	52	73	6/8/01	0.00	56	73	7/8/01	0.00	63	80	8/8/01	0.00	67	95
4/9/01	0.15	49	80	5/9/01	0.01	51	74	6/9/01	0.00	49	74	7/9/01	0.22	60	86	8/9/01	0.00	70	97
4/10/01	0.22	42	73	5/10/01	0.00	54	78	6/10/01	0.00	55	94	7/10/01	0.04	64	92	8/10/01	1.00	68	90
4/11/01	0.07	42	52	5/11/01	0.00	63	83	6/11/01	0.00	64	82	7/11/01	0.00	59	91	8/11/01	0.72	61	82
4/12/01	0.07	45	75	5/12/01	0.29	50	82	6/12/01	0.00	64	87	7/12/01	0.00	55	79	8/12/01	0.00	59	84
4/13/01	0.00	43	76	5/13/01	0.03	34	61	6/13/01	0.00	63	87	7/13/01	0.00	49	79	8/13/01	0.00	58	79
4/14/01	0.00	36	63	5/14/01	0.00	40	64	6/14/01	0.00	63	92	7/14/01	0.00	52	78	8/14/01	0.00	54	81
4/15/01	0.00	39	68	5/15/01	0.63	50	72	6/15/01	0.00	69	93	7/15/01	0.00	53	83	8/15/01	0.00	48	76
4/16/01	0.36	37	51	5/16/01	0.62	53	66	6/16/01	0.00	62	93	7/16/01	0.00	59	89	8/16/01	0.00	52	82
4/17/01	0.00	27	48	5/17/01	0.01	55	77	6/17/01	0.00	63	84	7/17/01	0.00	59	90	8/17/01	0.04	58	77
4/18/01	0.05	27	45	5/18/01	0.00	61	77	6/18/01	0.00	60	83	7/18/01	0.00	64	86	8/18/01	0.00	57	80
4/19/01	0.00	27	52	5/19/01	0.00	37	70	6/19/01	0.00	66	90	7/19/01	0.00	62	85	8/19/01	0.15	62	80
4/20/01	0.24	34	62	5/20/01	0.00	48	73	6/20/01	0.00	62	94	7/20/01	0.00	63	90	8/20/01	0.00	60	78
4/21/01	0.00	31	61	5/21/01	0.23	55	74	6/21/01	0.00	61	83	7/21/01	0.00	66	90	8/21/01	0.02	52	75
4/22/01	0.41	60	76	5/22/01	0.31	57	79	6/22/01	0.13	57	77	7/22/01	1.52	65	91	8/22/01	0.00	53	81
4/23/01	0.05	62	75	5/23/01	0.09	45	66	6/23/01	0.00	54	74	7/23/01	0.00	69	91	8/23/01	0.59	62	71
4/24/01	0.02	45	81	5/24/01	0.00	46	65	6/24/01	0.00	61	76	7/24/01	0.00	71	93	8/24/01	0.08	60	79
4/25/01	0.00	34	58	5/25/01	0.26	49	65	6/25/01	0.00	52	82	7/25/01	0.00	69	94	8/25/01	0.00	58	82
4/26/01	0.00	34	58	5/26/01	0.26	48	66	6/26/01	0.00	58	82	7/26/01	1.05	64	84	8/26/01	0.00	60	86
4/27/01	0.00	42	68	5/27/01	0.63	48	64	6/27/01	0.00	61	87	7/27/01	0.00	55	78	8/27/01	0.00	60	82
4/28/01	0.00	35	66	5/28/01	0.02	48	60	6/28/01	0.09	64	87	7/28/01	0.00	54	75	8/28/01	0.00	64	85
4/29/01	0.00	31	58	5/29/01	0.00	50	69	6/29/01	0.00	64	89	7/29/01	0.00	60	85	8/29/01	0.00	51	80
4/30/01	0.00	36	66	5/30/01	0.02	45	70	6/30/01	0.00	67	89	7/30/01	0.28	60	86	8/30/01	0.00	52	80
				5/31/01	0.00	43	66					7/31/01	0.00	61	87	8/31/01	0.00	52	87

Daily Weather Summary for 4/1/2001 to 8/31/2001 at OARDC, WOOSTER.
Wayne County, one mile south of Wooster; Latitude: 40° 47' N; Longitude: 81° 55' W; Elevation: 1020 ft.

APRIL				MAY				JUNE				JULY				AUGUST			
Date	Precip. (in)	Min. Temp. °F	Max. Temp. °F	Date	Precip. (in)	Min. Temp. °F	Max. Temp. °F	Date	Precip. (in)	Min. Temp °F	Max. Temp °F	Date	Precip. (in)	Min. Temp. °F	Max. Temp. °F	Date	Precip. (in)	Min. Temp °F	Max. Temp °F
4/1/01	0.07	29	49	5/1/01	0.39	45	82	6/1/01	0.36	51	70	7/1/01	0.48	54	80	8/1/01	0	63	95
4/2/01	0	25	54	5/2/01	0	52	82	6/2/01	0.28	51	63	7/2/01	0	45	72	8/2/01	0.09	68	91
4/3/01	0	31	58	5/3/01	0	54	78	6/3/01	0.01	48	63	7/3/01	0	47	74	8/3/01	0.25	71	80
4/4/01	0	30	57	5/4/01	0	56	85	6/4/01	0.04	42	67	7/4/01	0.19	61	78	8/4/01	0	65	86
4/5/01	0	30	70	5/5/01	0	53	74	6/5/01	0	45	74	7/5/01	0	51	78	8/5/01	0	62	90
4/6/01	0.83	53	69	5/6/01	0	52	75	6/6/01	0.43	57	64	7/6/01	0	47	78	8/6/01	0	62	91
4/7/01	0	57	82	5/7/01	0	56	71	6/7/01	0	52	74	7/7/01	0.03	51	79	8/7/01	0	61	93
4/8/01	0.12	62	78	5/8/01	0.39	53	71	6/8/01	0	50	75	7/8/01	0.01	63	86	8/8/01	0	73	95
4/9/01	0.43	50	78	5/9/01	0	47	76	6/9/01	0	46	78	7/9/01	0	57	91	8/9/01	1.57	71	95
4/10/01	0.2	47	74	5/10/01	0	46	80	6/10/01	0	50	81	7/10/01	0	63	87	8/10/01	0	65	84
4/11/01	0.32	56	78	5/11/01	0.53	59	81	6/11/01	0	64	84	7/11/01	0	57	76	8/11/01	0	60	85
4/12/01	0.06	55	80	5/12/01	0.24	41	61	6/12/01	0	63	86	7/12/01	0	52	78	8/12/01	0.87	64	79
4/13/01	0	42	62	5/13/01	0	34	62	6/13/01	0	60	91	7/13/01	0	51	77	8/13/01	0	64	83
4/14/01	0	37	67	5/14/01	0	36	68	6/14/01	0	63	91	7/14/01	0	51	79	8/14/01	0	53	77
4/15/01	0.59	40	53	5/15/01	0.29	53	58	6/15/01	0.01	69	91	7/15/01	0	52	86	8/15/01	0	49	83
4/16/01	0.04	30	53	5/16/01	0.42	52	62	6/16/01	0.05	60	80	7/16/01	0	57	88	8/16/01	0.06	62	83
4/17/01	0.01	27	40	5/17/01	0	59	73	6/17/01	0	57	79	7/17/01	0.1	61	85	8/17/01	0	62	79
4/18/01	0	29	49	5/18/01	0.19	60	71	6/18/01	0	53	86	7/18/01	0	67	87	8/18/01	0.05	58	78
4/19/01	0	28	60	5/19/01	0	51	74	6/19/01	0	61	90	7/19/01	0.12	64	86	8/19/01	0.32	61	76
4/20/01	0.5	46	54	5/20/01	0	46	79	6/20/01	0.05	65	81	7/20/01	0	64	89	8/20/01	0.02	60	71
4/21/01	0	54	75	5/21/01	0.51	63	78	6/21/01	0.11	65	82	7/21/01	0	66	89	8/21/01	0	57	81
4/22/01	0.24	62	79	5/22/01	0.29	48	62	6/22/01	0.08	59	69	7/22/01	0	67	91	8/22/01	0.04	53	76
4/23/01	0	60	81	5/23/01	0.01	42	66	6/23/01	0	55	74	7/23/01	0	70	94	8/23/01	0.06	63	73
4/24/01	0.01	37	67	5/24/01	0.05	45	64	6/24/01	0	53	78	7/24/01	0	73	94	8/24/01	0	65	82
4/25/01	0	31	58	5/25/01	0.11	46	66	6/25/01	0	51	82	7/25/01	0	69	86	8/25/01	0	61	86
4/26/01	0	28	66	5/26/01	0.36	43	68	6/26/01	0	57	87	7/26/01	0.14	59	81	8/26/01	0.8	68	81
4/27/01	0.02	41	69	5/27/01	0.17	50	64	6/27/01	0	63	89	7/27/01	0	56	81	8/27/01	0	60	84
4/28/01	0	32	58	5/28/01	0	49	67	6/28/01	0	61	89	7/28/01	0	55	85	8/28/01	0	60	81
4/29/01	0	28	70	5/29/01	0.04	46	70	6/29/01	0	62	89	7/29/01	0	66	83	8/29/01	0	53	81
4/30/01	0	37	81	5/30/01	0	42	63	6/30/01	0.03	67	86	7/30/01	0	61	88	8/30/01	0.02	53	84
				5/31/01	0	37	68					7/31/01	0	63	91	8/31/01	0.98	62	74

Daily Weather Summary for 4/1/2002 to 8/31/2002 at OARDC - Muck Crops Research Branch, Celeryville, OH.
Huron County, Latitude: 41° 01' N; Longitude: 82° 44' W.

APRIL				MAY				JUNE				JULY				AUGUST			
Date	Precip. (in)	Min. Temp. °F	Max. Temp. °F	Date	Precip. (in)	Min. Temp. °F	Max. Temp. °F	Date	Precip. (in)	Min. Temp. °F	Max. Temp. °F	Date	Precip. (in)	Min. Temp. °F	Max. Temp. °F	Date	Precip. (in)	Min. Temp. °F	Max. Temp. °F
4/1/02	.	.	.	5/1/02	0.02	36.1	67.2	6/1/02	0	.	.	7/1/02	0.43	71.2	94.6	8/1/02	0	66.4	98.2
4/2/02	.	.	.	5/2/02	0.52	39.6	64.8	6/2/02	0	52.1	78	7/2/02	0	69.6	95	8/2/02	0	71.2	91.7
4/3/02	.	.	.	5/3/02	0	35.3	54.9	6/3/02	0.13	52.9	73.2	7/3/02	0	64.4	96.6	8/3/02	0	67.6	93.3
4/4/02	.	.	.	5/4/02	0	30.7	65.6	6/4/02	0	59.6	92.5	7/4/02	0	70	97	8/4/02	0.07	64	96.2
4/5/02	.	.	.	5/5/02	0	38.4	76.8	6/5/02	0.31	56.5	84.4	7/5/02	0	56.5	78.8	8/5/02	0.36	65.6	86.4
4/6/02	.	.	.	5/6/02	0.15	53.3	66.4	6/6/02	0.11	50.6	60.4	7/6/02	0	50.6	83.2	8/6/02	0	54.1	72
4/7/02	.	.	.	5/7/02	0	51.3	70.8	6/7/02	0	45.5	72.8	7/7/02	0	50.2	89.3	8/7/02	0	49	75.2
4/8/02	.	.	.	5/8/02	0.33	42.3	64.4	6/8/02	0	49	84	7/8/02	0	52.5	92.5	8/8/02	0	46.2	78.8
4/9/02	.	.	.	5/9/02	0.01	51.7	72.4	6/9/02	0	56.1	88.5	7/9/02	0	73.2	85.6	8/9/02	0	44.7	86.4
4/10/02	.	.	.	5/10/02	0	39.6	64	6/10/02	0	59.6	90.5	7/10/02	0	62	80.8	8/10/02	0	51.3	90.5
4/11/02	.	.	.	5/11/02	0.27	35	62.4	6/11/02	0	68	88.9	7/11/02	0	55.3	79.6	8/11/02	0	58.8	93.3
4/12/02	.	.	.	5/12/02	1.02	51	69.6	6/12/02	0.12	70	82.8	7/12/02	0	44.3	85.6	8/12/02	0	68.8	86.8
4/13/02	.	.	.	5/13/02	0.7	45.5	64.8	6/13/02	0	60.4	75.6	7/13/02	0	53.3	86	8/13/02	0	67.2	93.7
4/14/02	.	.	.	5/14/02	0.04	40.8	62	6/14/02	0.42	56.9	73.2	7/14/02	0	56.5	88.9	8/14/02	0	70.4	88.9
4/15/02	.	.	.	5/15/02	0	37.7	69.2	6/15/02	0.07	54.5	71.2	7/15/02	0	55.3	91.7	8/15/02	0	69.2	87.7
4/16/02	0	68	82.8	5/16/02	0.33	53.7	75.2	6/16/02	0	54.9	73.6	7/16/02	0	62.8	94.6	8/16/02	0	72.4	89.3
4/17/02	0	64.4	81.6	5/17/02	0.03	40.8	59.6	6/17/02	0.02	47.8	76.4	7/17/02	0	65.6	90.1	8/17/02	0	59.6	87.3
4/18/02	0	58	82.8	5/18/02	0.18	35.3	49	6/18/02	0	55.7	80.4	7/18/02	0.08	68.8	88.5	8/18/02	0	62	86
4/19/02	0	57.3	84	5/19/02	0	31.9	51.3	6/19/02	0	55.3	87.3	7/19/02	0.01	68.4	87.3	8/19/02	0.36	59.2	78
4/20/02	0.04	42	54.9	5/20/02	0	36.9	47	6/20/02	0	61.6	88	7/20/02	0	60.4	88.9	8/20/02	0	53.3	70.8
4/21/02	0.1	38.8	44.3	5/21/02	0.01	36.1	52.5	6/21/02	0	67.2	92.9	7/21/02	0	56.1	94.6	8/21/02	0	49.8	86
4/22/02	0.01	36.5	43.9	5/22/02	0	30.3	64.8	6/22/02	0	64.4	92.8	7/22/02	0.27	74	92.1	8/22/02	0.47	65.6	90.5
4/23/02	0	31.9	51.3	5/23/02	0	41.2	77.6	6/23/02	0	68	92.5	7/23/02	0.41	62.4	77.6	8/23/02	0.51	69.6	86.4
4/24/02	0	34.2	70.8	5/24/02	0.13	48.6	72.8	6/24/02	0	65.2	95	7/24/02	0	52.5	79.6	8/24/02	0.04	66.8	78.8
4/25/02	0.06	37.3	61.6	5/25/02	0.14	.	.	6/25/02	0.06	64	95.8	7/25/02	0	55.3	86.8	8/25/02	0	60.8	82.8
4/26/02	0	29.2	58.8	5/26/02	0	.	.	6/26/02	0	71.2	90.1	7/26/02	0.04	64	87.7	8/26/02	0	56.5	82.4
4/27/02	0.19	31.5	56.5	5/27/02	0	.	.	6/27/02	0	70.8	86	7/27/02	0.22	66.8	80.8	8/27/02	0	52.9	84
4/28/02	0.45	40.8	66.8	5/28/02	0.44	.	.	6/28/02	0	62.8	84	7/28/02	0	75.2	90.5	8/28/02	0	58.8	82.4
4/29/02	0	37.3	45.9	5/29/02	0	.	.	6/29/02	0	55.7	89.7	7/29/02	0.13	72	92.5	8/29/02	0	58.8	82
4/30/02	0.02	36.9	58.4	5/30/02	0.14	.	.	6/30/02	0	62.8	91.3	7/30/02	0	68	88.1	8/30/02	0	52.9	82.4
				5/31/02	0.01	.	.					7/31/02	0	64.8	94.6	8/31/02	0	51.3	86.4

Daily Weather Summary for 4/1/2002 to 8/31/2002 at OARDC - Vegetable Crops Research Branch, Fremont, OH
Sandusky County, Latitude: 41° 21' N; Longitude: 83° 07' W; Elevation: 636 ft.

APRIL				MAY				JUNE				JULY				AUGUST			
Date	Precip. (in)	Min. Temp. °F	Max. Temp. °F	Date	Precip. (in)	Min. Temp. °F	Max. Temp. °F	Date	Precip. (in)	Min. Temp. °F	Max. Temp. °F	Date	Precip. (in)	Min. Temp. °F	Max. Temp. °F	Date	Precip. (in)	Min. Temp. °F	Max. Temp. °F
4/1/02	0	32	55	5/1/02	0.02	37	60	6/1/02	0	52	89	7/1/02	0	70	93	8/1/02	0	67	92
4/2/02	0.04	34	49	5/2/02	0.95	41	67	6/2/02	0	52	89	7/2/02	0	71	95	8/2/02	0	71	94
4/3/02	0.26	33	59	5/3/02	0	37	54	6/3/02	0	55	77	7/3/02	0	71	95	8/3/02	0	65	89
4/4/02	0	25	45	5/4/02	0	32	57	6/4/02	1.48	52	69	7/4/02	0	71	97	8/4/02	0	64	86
4/5/02	0	28	41	5/5/02	0	33	62	6/5/02	0.14	64	88	7/5/02	0.1	67	96	8/5/02	0	71	93
4/6/02	0	25	39	5/6/02	0	46	76	6/6/02	0.22	55	81	7/6/02	0	53	77	8/6/02	0.11	61	82
4/7/02	0	25	43	5/7/02	0.2	57	66	6/7/02	0	45	62	7/7/02	0	53	80	8/7/02	0	52	73
4/8/02	0.1	29	54	5/8/02	0.13	43	69	6/8/02	0	50	72	7/8/02	0	56	84	8/8/02	0	48	74
4/9/02	0.95	54	61	5/9/02	0.32	44	68	6/9/02	0	56	84	7/9/02	0	63	93	8/9/02	0	47	76
4/10/02	0.05	31	58	5/10/02	0.02	42	73	6/10/02	0	60	85	7/10/02	0.55	66	85	8/10/02	0	49	81
4/11/02	0	31	60	5/11/02	0	36	64	6/11/02	0	64	91	7/11/02	0	65	86	8/11/02	0	57	90
4/12/02	0.06	34	71	5/12/02	0.15	43	62	6/12/02	0.03	68	90	7/12/02	0	48	75	8/12/02	0	68	93
4/13/02	0.61	53	71	5/13/02	0.98	46	69	6/13/02	0.06	59	84	7/13/02	0	53	79	8/13/02	0	69	90
4/14/02	0.11	51	63	5/14/02	0.28	39	50	6/14/02	0.21	58	73	7/14/02	0	78	85	8/14/02	0	70	92
4/15/02	0.06	51	64	5/15/02	0.2	38	65	6/15/02	0.08	53	76	7/15/02	0	61	86	8/15/02	0.44	67	88
4/16/02	0	58	82	5/16/02	0	41	70	6/16/02	0	52	75	7/16/02	0	63	91	8/16/02	0	67	86
4/17/02	0	63	86	5/17/02	0.44	43	75	6/17/02	0	49	74	7/17/02	0	68	91	8/17/02	0	68	87
4/18/02	0	60	83	5/18/02	0.03	37	49	6/18/02	0.08	51	78	7/18/02	0	69	93	8/18/02	0	68	86
4/19/02	0	62	82	5/19/02	0.01	33	51	6/19/02	0	56	79	7/19/02	0	66	93	8/19/02	0	57	83
4/20/02	0.5	43	85	5/20/02	0.03	36	54	6/20/02	0	56	88	7/20/02	0	60	89	8/20/02	0.36	53	78
4/21/02	0.01	38	61	5/21/02	0	36	54	6/21/02	0	68	93	7/21/02	0	58	86	8/21/02	0	51	77
4/22/02	0.2	36	43	5/22/02	0	34	51	6/22/02	0.86	64	93	7/22/02	0	71	96	8/22/02	0	53	81
4/23/02	0	32	43	5/23/02	0	38	65	6/23/02	0	69	92	7/23/02	0.61	71	92	8/23/02	1.83	69	88
4/24/02	0	29	53	5/24/02	0	48	78	6/24/02	0	67	92	7/24/02	0	58	96	8/24/02	0.57	66	84
4/25/02	0.02	37	71	5/25/02	0	45	72	6/25/02	0	65	94	7/25/02	0	58	78	8/25/02	0	58	80
4/26/02	0	32	57	5/26/02	0.45	43	78	6/26/02	0.47	69	95	7/26/02	0	61	80	8/26/02	0	58	83
4/27/02	0	31	58	5/27/02	0	44	69	6/27/02	0.02	69	86	7/27/02	0.48	65	88	8/27/02	0	54	81
4/28/02	0.33	39	59	5/28/02	0	49	78	6/28/02	0	63	84	7/28/02	1	70	85	8/28/02	0	56	81
4/29/02	0.17	36	68	5/29/02	0	59	76	6/29/02	0	58	82	7/29/02	0.59	66	91	8/29/02	0	57	78
4/30/02	0	37	50	5/30/02	0.11	63	77	6/30/02	0	60	89	7/30/02	0.31	66	91	8/30/02	0	55	77
				5/31/02	0	64	81					7/31/02	0	67	86	8/31/02	0	52	80

Daily Weather Summary for 4/1/2002 to 8/31/2002 at OARDC, WOOSTER.
Wayne County, one mile south of Wooster; Latitude: 40° 47' N; Longitude: 81° 55' W; Elevation: 1020 ft.

APRIL				MAY				JUNE				JULY				AUGUST			
Date	Precip. (in)	Min. Temp. °F	Max. Temp. °F	Date	Precip. (in)	Min. Temp. °F	Max. Temp. °F	Date	Precip. (in)	Min. Temp °F	Max. Temp °F	Date	Precip. (in)	Min. Temp. °F	Max. Temp. °F	Date	Precip. (in)	Min. Temp °F	Max. Temp °F
4/1/01	0.06	34.3	49.8	5/1/01	0.13	38.4	66.9	6/1/01	0	53.2	83.7	7/1/01	0.01	68.8	92.6	8/1/01	0	65.2	96.9
4/2/01	0.8	41.6	69.7	5/2/01	0.08	40	67.8	6/2/01	0	53.4	74.9	7/2/01	0	70.6	94.6	8/2/01	0.03	67.7	94.2
4/3/01	0.44	30.1	46.8	5/3/01	0	32.5	55.5	6/3/01	0.22	50	73.4	7/3/01	0	66.4	94.1	8/3/01	0	65.4	92.1
4/4/01	0	26.9	41	5/4/01	0	28	67.6	6/4/01	1.04	55.7	90.1	7/4/01	0	69.9	93.2	8/4/01	0	61.7	94.7
4/5/01	0.06	27	39.6	5/5/01	0	37.1	74.6	6/5/01	0.94	58.9	85.8	7/5/01	0	57.6	79.7	8/5/01	0.12	62.1	89
4/6/01	0.01	22.6	40.9	5/6/01	0.06	47.6	68.7	6/6/01	0.32	52.4	61.3	7/6/01	0	54.9	82.6	8/6/01	0	52.2	74.3
4/7/01	0	23.7	59.8	5/7/01	0.09	50.3	73.3	6/7/01	0	47.4	75.8	7/7/01	0	49.8	88.7	8/7/01	0	49.2	76.2
4/8/01	0.18	45	70.3	5/8/01	0.22	41.7	66.6	6/8/01	0	51	85.2	7/8/01	0	54.4	90.3	8/8/01	0	49.2	79.6
4/9/01	0.4	38.6	69.3	5/9/01	0.13	51.7	74.8	6/9/01	0	59	88.2	7/9/01	0	69.1	82.4	8/9/01	0	48.1	87.2
4/10/01	0	31.7	61.2	5/10/01	0	41.6	63.7	6/10/01	0	60.1	90.3	7/10/01	0	59.5	81.3	8/10/01	0	53.2	91.1
4/11/01	0	35.9	79.3	5/11/01	0.22	37.1	64.4	6/11/01	0	65.8	85.8	7/11/01	0	52.7	77.7	8/11/01	0	57.9	93.3
4/12/01	0.17	51.4	75.7	5/12/01	0.83	49.8	72.6	6/12/01	0.06	68.9	83.6	7/12/01	0	49.1	85.5	8/12/01	0.22	64.6	87.5
4/13/01	0.29	53.5	68.6	5/13/01	0.5	44.7	65.6	6/13/01	0	61.5	79.2	7/13/01	0	56.2	82.4	8/13/01	0	63.4	93.5
4/14/01	0.76	50.7	62.3	5/14/01	0.05	42.1	61.9	6/14/01	0.31	58.4	76.4	7/14/01	0	59.6	88.4	8/14/01	0.39	69.2	90.1
4/15/01	0	58.4	80	5/15/01	0.01	39.8	69.8	6/15/01	0.06	54.3	70.7	7/15/01	0	54.6	90.7	8/15/01	0.17	69.8	86.4
4/16/01	0	60.9	85	5/16/01	0.19	53	76.4	6/16/01	0	53.6	71.2	7/16/01	0	63.9	92.3	8/16/01	0.31	72.1	90.1
4/17/01	0	63.7	84.6	5/17/01	0.43	40.7	60.4	6/17/01	0	51.1	76	7/17/01	0	61.6	92.5	8/17/01	0	68.3	84.3
4/18/01	0	59.6	83	5/18/01	0.07	35.1	50.4	6/18/01	0	54.6	79.6	7/18/01	0.1	70.4	87.7	8/18/01	0	64	83.2
4/19/01	0.11	58.6	84	5/19/01	0	32	53.5	6/19/01	0	53.4	88.6	7/19/01	0.1	67.2	84.5	8/19/01	0.15	64	79.4
4/20/01	0.09	43.6	58.6	5/20/01	0	34.7	49	6/20/01	0	56.2	90.6	7/20/01	0	61.8	89.1	8/20/01	0	56.4	79.1
4/21/01	0.13	39.5	46.1	5/21/01	0	29	55.7	6/21/01	0	59.5	92.4	7/21/01	0	56.7	93.9	8/21/01	0	52.6	87
4/22/01	0	37.4	44.3	5/22/01	0	30.4	67.2	6/22/01	0	63.6	90.1	7/22/01	0.56	74.5	91.7	8/22/01	0.1	62.9	90.7
4/23/01	0	35.7	53.9	5/23/01	0	37.1	76.2	6/23/01	0	63.1	90.8	7/23/01	0	63.8	81.9	8/23/01	0.38	67.6	88.4
4/24/01	0	32	69.5	5/24/01	0.09	47.2	72.7	6/24/01	0	63.1	92.2	7/24/01	0	57.7	82	8/24/01	0.09	64.7	79
4/25/01	0.06	39.5	61.9	5/25/01	0.2	47.2	79.7	6/25/01	0	63.7	94.7	7/25/01	0	54.9	87.9	8/25/01	0.01	60.2	82.8
4/26/01	0	33.9	58.8	5/26/01	0	47.1	72.3	6/26/01	0.06	70.6	89.2	7/26/01	0.06	63.5	88.5	8/26/01	0	57.6	79.6
4/27/01	0.3	30.5	57	5/27/01	0	43.4	81.6	6/27/01	0.24	67.5	83.4	7/27/01	0	68	81.5	8/27/01	0	56.3	82.5
4/28/01	0.22	72.2	40.9	5/28/01	0.04	56.8	78	6/28/01	0	60.6	82.1	7/28/01	0	75	92.1	8/28/01	0	58.4	84.7
4/29/01	0.02	37.9	44.3	5/29/01	0.4	57.5	81.7	6/29/01	0	56.1	87.2	7/29/01	0.03	71.9	93.3	8/29/01	0	58.5	80.2
4/30/01	0.01	39.6	60.5	5/30/01	0.24	61.9	80.6	6/30/01	0	60.4	89.4	7/30/01	0	66.6	88.5	8/30/01	0	56.3	82.5
				5/31/01	0.01	61.2	84.1					7/31/01	0	64.7	93.1	8/31/01	0	55.2	86.2

The Ohio State University

CURCURBITS- PERFORMANCE OF STRATEGY AND SANDEA

Trial ID: CURCURFRE 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

COOPERATOR/LANDOWNER

Cooperator: Matt Hofelich Country: USA
Org: OARDC Veg.Crops Research Branch Phone No: 419-332-5142
Address 1: 1165 CR 43
City: Fremont
State/Prov: Ohio
Postal Code: 43420

Conducted Under GLP (Y/N): N Conducted Under GEP (Y/N): N

Objective: Evaluate herbicide combinations for curcurbit crops.

CROP AND WEED DESCRIPTION

Weed	Code	Common Name	Scientific Name
1	CHEAL	common lambsquarter	Chenopodium album L.
2	SOLPT	eastern black nightshade	Solanum ptycanthum Dun.
3	POROL	common purslane	Portulaca oleracea L.
4	ABUTH	velvetleaf	Abutilon theophrasti medicus
5	AMAXX	pigweed species	Amaranth spp.
6	AGRASS	annual grasses (various)	Setaria spp. and Digitaria spp.

Crop 1: CUUPE PUMPKIN Variety: APPALACHIAN
Planting Date: 06/14/02 Planting Method: CONVENTIONAL
Rate: 2 SEEDS/9" Depth: 1.5 IN
Row Spacing: 7.5 ft. Seed Bed: CONVENTIONAL
Soil Moisture: DRY Emergence Date: 06/21/02

Crop 2: CUMSA CUCUMBER Variety: VLASSET
Planting Date: 06/14/02 Planting Method: CONVENTIONAL
Rate: 2 SEEDS/9" Depth: 1 IN
Row Spacing: 30 " Seed Bed: CONVENTIONAL
Soil Moisture: DRY Emergence Date: 06/21/02

Crop 3: CUMHY HYBRID CANTALOUPE Variety: ECLIPSE
Planting Date: 06/14/02 Planting Method: CONVENTIONAL
Rate: 2 SEEDS/9" Depth: 1 IN
Row Spacing: 30 " Seed Bed: CONVENTIONAL
Soil Moisture: DRY Emergence Date: 06/28/02

SITE AND DESIGN

Plot Width, Unit: 6 FT Plot Length, Unit: 30 FT Reps: 3
Site Type: LEVEL FIELD
Tillage Type: CONVENTIONAL Study Design: RANDOMIZED COMPLETE BLOCK

MAINTENANCE

Field Prep./Maintenance:
11/1: Chisel plowed
5/28: Applied fertilizer: @150# 18-46-0); 125# (46-0-0); & 350# (0-0-60), per acre; worked in with Danish tine
6/14: Layed out, staked & planted plot area
6/17: Preemergent treatments applied
6/21 & 7/18: Irrigated with 1.5" water

6/25: Replanted melons & pumpkins due to heavy rains
6/27 & 6/28: Sprayed Thiodan for cucumber beetle control
7/3: Thinned pickles; post applications of herbicides applied
7/25: Applied 2 pt.Bravo Weatherstick , and 6 oz. Pounce 3EC per acre
7/30: First pickle harvest and evaluation
8/2: Applied 8 oz.Pounce, 3 pts. Bravo, & 1.25 pts. Champ 2 per acre; 2nd pickle harvest
8/5: Third pickle harvest
8/8: Applied 1.5# Maneb, 1 pt. Champ, and 2 oz. Spintor per acre; also 4th pickle harvest.
8/12: 5th pickle harvest
8/16: 6th pickle harvest
8/17: Applied 1.5# Maneb, 1.5 pt. Champ, 2.5 pt. Dimethoate, & .50lb. Javelin
8/19: 7th pickle harvest
8/22: 8th pickle harvest
8/26: 9th pickle harvest
8/27: applied 3 pts. Bravo, 4 oz. Spintor, .5 pts. Dimethoate to pumpkins & melons
9/6: Applied 11 oz. Quadris, 3 oz. Pounce, to melons and pumpkins
9/11: Harvested and evaluated muskmelon plots
9/13: Applied 1.5 qts. Manex, 6 oz. Spintor, 1 pt. Dimethoate to pumpkins only
9/26: Applied 1.5 qts. Manex, 6 oz. Pounce, &.67 pt. Dimethoate
10/16: Harvested and evaluated pumpkin plots

SOIL DESCRIPTION

% Sand: 70	% OM: 3	Texture:	FINE SANDY LOAM
% Silt: 20	pH: 5.8	Soil Name:	COLWOOD
% Clay: 10	CEC: 7.6	Fert. Level:	MODERATE

APPLICATION DESCRIPTION

	A	B
Applicatic	6/17/2002	7/3/2002
Time of D	11-12 AM	1 -2 PM
Applicatic	SPRAY	SPRAY
Applicatic	PRE	POST
Applic. Pl	BDCST	BDCST
Air Temp.	65 F	80 F
Wind Velc	2 MPH	3 MPH
Dew Pres	N	N
% Cloud (	30	30

CROP STAGE AT EACH APPLICATION

	A	B
Crop 1 Co	CUUPE PRE	CUUPE POST
Stage Sc	.	2-5 tr.lf
Height, I	0. .	8 in.
Crop 2 Co	CUMSA PR	CUMSA POST
Stage Sc	.	2-5 tr.lf

Height, I	0. .	8 in.
Crop 3 Co	CUMHY PR	CUMHY POST
Stage Sc	.	2-5 tr.lf
Height, I	0. .	8 in.

WEED STAGE AT EACH APPLICATION

	A	B
Weed 1 C	CHEAL PRE	CHEAL POST
Stage Sc	.	0.5-2" hi
Density,	. .	med. .
Weed 2 C	SOLPT PRE	SOLPT POST
Stage Sc	.	0.5-2" hi
Density,	. .	med. .
Weed 3 C	POROL PRE	POROL POST
Stage Sc	.	0.5-2" hi
Density,	. .	med. .
Weed 4 C	ABUTH PRE	ABUTH POST
Stage Sc	.	0.5-2" hi
Density,	. .	low .
Weed 5 C	AMAXX PRI	AMAXX POST
Stage Sc	.	0.5-2" hi
Density,	. .	med .
Weed 6 C	AGRAS PRI	AGRAS POST
Stage Sc	.	0.5-2" hi
Density,	. .	med .

APPLICATION EQUIPMENT

	A	B
Appl. Equ	CO2 BACK	CO2 BACKP
Operating	35 PSI	35 PSI
Nozzle Ty	FLAT FAN	FLAT FAN
Nozzle Si	8002VS	8002VS
Nozzle Sp	12 IN.	12 IN.
Nozzles/I	4	4
Band Wid	48 IN.	48 IN.
Boom Hei	18 IN.	18 IN.
Ground S	4 MPH	4 MPH
Carrier:	WATER	WATER
Propellan	CO2	CO2

The Ohio State University

CURCURBITS- PERFORMANCE OF STRATEGY AND SANDEA

Trial ID: CURCURFRE 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Trial Comments

For the rating taken on June 24, "injury" consisted mainly of white margins on the leaves, or in some cases (in the pumpkins) a mottled appearance. On July 7, injury ratings included plant stunting, chlorosis, and mottling. Weed ratings were based on:(0 % = no control to 100% = complete control) of that species. Yields were taken from the entire plot and weighed in kilograms; cucumber yields were taken over time; melons and pumpkins were harvested on a one time basis. Plots in the central area of the experiment and spanning all 3 blocks were flooded following seeding and during emergence, causing severe soil crusting. Emergence and crop growth in these plots were reduced, and these effects were confounded with any injury symptoms caused by herbicide treatments.

The Ohio State University

CURCURBITS- PERFORMANCE OF STRATEGY AND SANDEA

Trial ID: CURCURFRE 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					CUMHY	CUMSA	CUUPE	CUMHY	CUUPE
Part Rated					PLANT	PLANT	PLANT	PLANT	PLANT
Rating Data Type					INJURY	INJURY	INJURY	INJURY	INJURY
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/24/2002	6/24/2002	6/24/2002	7/1/2002	7/1/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	1	2	3	4	5
WEEDY CONTROL					0 a	0 d	0 b	0 a	0 a
WEED FREE CONTROL					0 a	0 d	0 b	0 a	0 a
STRATEGY	5	PT/A	PRE	A	0 a	7 b	0 b	0 a	3 a
STRATEGY	5	PT/A	PRE	A	0 a	0 d	0 b	0 a	0 a
ALANAP	5	QT/A	PRE	A					
STRATEGY	5	PT/A	PRE	A	0 a	5 bc	0 b	0 a	7 a
SANDEA +	0.5	OZ/A	POST	B					
NIS	0.4	PT/A	POST	B					
STRATEGY	5	PT/A	PRE	A	0 a	2 cd	0 b	0 a	7 a
SANDEA +	0.66	OZ/A	POST	B					
NIS	0.4	PT/A	POST	B					
COMMAND	1.3	PT/A	PRE	A	0 a	5 bc	0 b	0 a	2 a
SANDEA +	0.5	OZ/A	POST	B					
NIS +	0.4	PT/A	POST	B					
POAST +	1.25	PT/A	POST	B					
COC	1	QT/A	POST	B					
COMMAND	1.3	PT/A	PRE	A	0 a	3 bcd	0 b	3 a	3 a
SANDEA +	0.66	OZ/A	POST	B					
NIS	0.4	PT/A	POST	B					
POAST +	1.25	PT/A	POST	B					
COC	1	QT/A	POST	B					
COMMAND	1.3	PT/A	PRE	A	0 a	3 bcd	2 b	0 a	0 a
SANDEA +	0.66	OZ/A	POST	B					
POAST +	1.25	PT/A	POST	B					
COC	1	QT/A	POST	B					
COMMAND	2.66	PT/A	PRE	A	0 a	13 a	8 a	2 a	5 a
LSD (P=.05)					0	4.6	3.6	3.6	10.7
CV					0	69.2	208.61	417.22	234.96

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

CURCURBITS- PERFORMANCE OF STRATEGY AND SANDEA

Trial ID: CURCURFRE 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									AGRASS
Crop Code					CUMSA	CUMHY	CUUPE	CUMSA	ALL
Part Rated					PLANT	PLANT	PLANT	PLANT	WEED
Rating Data Type					INJURY	INJURY	INJURY	INJURY	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/1/2002	7/10/2002	7/10/2002	7/10/2002	7/10/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	6	7	8	9	10
WEEDY CONTROL					0 d	0 b	0 b	0 c	0 b
WEED FREE CONTROL					0 d	0 b	0 b	0 c	99 a
STRATEGY	5	PT/A	PRE	A	8 bc	0 b	3 b	12 bc	98 a
STRATEGY	5	PT/A	PRE	A	0 d	0 b	5 b	3 c	98 a
ALANAP	5	QT/A	PRE	A					
STRATEGY	5	PT/A	PRE	A	7 bcd	0 b	40 a	25 ab	99 a
SANDEA +	0.5	OZ/A	POST	B					
NIS	0.4	PT/A	POST	B					
STRATEGY	5	PT/A	PRE	A	7 bcd	0 b	27 ab	30 a	99 a
SANDEA +	0.66	OZ/A	POST	B					
NIS	0.4	PT/A	POST	B					
COMMAND	1.3	PT/A	PRE	A	10 abc	0 b	37 a	20 ab	99 a
SANDEA +	0.5	OZ/A	POST	B					
NIS +	0.4	PT/A	POST	B					
POAST +	1.25	PT/A	POST	B					
COC	1	QT/A	POST	B					
COMMAND	1.3	PT/A	PRE	A	13 ab	3 a	25 ab	23 ab	99 a
SANDEA +	0.66	OZ/A	POST	B					
NIS	0.4	PT/A	POST	B					
POAST +	1.25	PT/A	POST	B					
COC	1	QT/A	POST	B					
COMMAND	1.3	PT/A	PRE	A	5 cd	0 b	22 ab	25 ab	99 a
SANDEA +	0.66	OZ/A	POST	B					
POAST +	1.25	PT/A	POST	B					
COC	1	QT/A	POST	B					
COMMAND	2.66	PT/A	PRE	A	17 a	0 b	10 ab	12 bc	99 a
LSD (P=.05)					7.4	3.1	30.8	13.5	1.7
CV					64.87	547.72	106.54	52.63	1.1

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

CURCURBITS- PERFORMANCE OF STRATEGY AND SANDEA

Trial ID: CURCURFRE 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					SOLPT	CHEAL	AMAXX	ABUTH	POROL
Crop Code					ALL	ALL	ALL	ALL	ALL
Part Rated					WEED	WEED	WEED	WEED	WEED
Rating Data Type					CONTROL	CONTROL	CONTROL	CONTROL	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/10/2002	7/10/2002	7/10/2002	7/10/2002	7/10/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	11	12	13	14	15
WEEDY CONTROL					0 b	0 c	0 b	0 b	0 c
WEED FREE CONTROL					99 a	99 a	99 a	99 a	99 a
STRATEGY	5	PT/A	PRE	A	98 a	93 a	96 a	99 a	93 a
STRATEGY	5	PT/A	PRE	A	93 a	78 b	98 a	99 a	78 b
ALANAP	5	QT/A	PRE	A					
STRATEGY	5	PT/A	PRE	A	98 a	96 a	96 a	99 a	96 a
SANDEA +	0.5	OZ/A	POST	B					
NIS	0.4	PT/A	POST	B					
STRATEGY	5	PT/A	PRE	A	95 a	96 a	98 a	99 a	96 a
SANDEA +	0.66	OZ/A	POST	B					
NIS	0.4	PT/A	POST	B					
COMMAND	1.3	PT/A	PRE	A	88 a	96 a	96 a	99 a	96 a
SANDEA +	0.5	OZ/A	POST	B					
NIS +	0.4	PT/A	POST	B					
POAST +	1.25	PT/A	POST	B					
COC	1	QT/A	POST	B					
COMMAND	1.3	PT/A	PRE	A	93 a	96 a	96 a	99 a	96 a
SANDEA +	0.66	OZ/A	POST	B					
NIS	0.4	PT/A	POST	B					
POAST +	1.25	PT/A	POST	B					
COC	1	QT/A	POST	B					
COMMAND	1.3	PT/A	PRE	A	88 a	91 ab	96 a	99 a	91 ab
SANDEA +	0.66	OZ/A	POST	B					
POAST +	1.25	PT/A	POST	B					
COC	1	QT/A	POST	B					
COMMAND	2.66	PT/A	PRE	A	93 a	95 a	96 a	99 a	95 a
LSD (P=.05)					12.6	14.8	3.8	0	14.8
CV					8.73	10.23	2.56	0	10.23

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

CURCURBITS- PERFORMANCE OF STRATEGY AND SANDEA

Trial ID: CURCURFRE 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								AGRASS	SOLPT
Crop Code					CUMHY	CUUPE	CUMSA	ALL	ALL
Part Rated					PLANT	PLANT	PLANT	WEED	WEED
Rating Data Type					INJURY	INJURY	INJURY	CONTROL	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/24/2002	7/24/2002	7/24/2002	7/24/2002	7/24/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	16	17	18	19	20
WEEDY CONTROL					0 c	0 a	0 a	0 b	0 c
WEED FREE CONTROL					0 c	0 a	0 a	99 a	99 a
STRATEGY	5	PT/A	PRE	A	0 c	7 a	0 a	99 a	90 ab
STRATEGY	5	PT/A	PRE	A	0 c	17 a	7 a	99 a	88 ab
ALANAP	5	QT/A	PRE	A					
STRATEGY	5	PT/A	PRE	A	7 bc	20 a	10 a	99 a	96 ab
SANDEA +	0.5	OZ/A	POST	B					
NIS	0.4	PT/A	POST	B					
STRATEGY	5	PT/A	PRE	A	23 a	30 a	12 a	99 a	96 ab
SANDEA +	0.66	OZ/A	POST	B					
NIS	0.4	PT/A	POST	B					
COMMAND	1.3	PT/A	PRE	A	0 c	7 a	7 a	99 a	85 b
SANDEA +	0.5	OZ/A	POST	B					
NIS +	0.4	PT/A	POST	B					
POAST +	1.25	PT/A	POST	B					
COC	1	QT/A	POST	B					
COMMAND	1.3	PT/A	PRE	A	17 ab	33 a	7 a	99 a	90 ab
SANDEA +	0.66	OZ/A	POST	B					
NIS	0.4	PT/A	POST	B					
POAST +	1.25	PT/A	POST	B					
COC	1	QT/A	POST	B					
COMMAND	1.3	PT/A	PRE	A	3 c	17 a	0 a	99 a	87 ab
SANDEA +	0.66	OZ/A	POST	B					
POAST +	1.25	PT/A	POST	B					
COC	1	QT/A	POST	B					
COMMAND	2.66	PT/A	PRE	A	7 bc	12 a	12 a	99 a	90 ab
LSD (P=.05)					12.3	38.3	17.5	0	13.1
CV					126.62	157.65	191.71	0	9.29

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

CURCURBITS- PERFORMANCE OF STRATEGY AND SANDEA

Trial ID: CURCURFRE 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					CHEAL	AMAXX	ABUTH	POROL	
Crop Code					ALL	ALL	ALL	ALL	CUMSA
Part Rated					WEED	WEED	WEED	WEED	FRUIT
Rating Data Type					CONTROL	CONTROL	CONTROL	CONTROL	TOT.MKTBLE
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	TONS/A.
Rating Date					7/24/2002	7/24/2002	7/24/2002	7/24/2002	8/8/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	21	22	23	24	42
WEEDY CONTROL					0 b	0 b	0 b	0 d	1.8 a
WEED FREE CONTROL					99 a	99 a	99 a	99 a	1.6 a
STRATEGY	5	PT/A	PRE	A	99 a	99 a	99 a	85 b	2.4 a
STRATEGY	5	PT/A	PRE	A	99 a	99 a	99 a	57 c	2.2 a
ALANAP	5	QT/A	PRE	A					
STRATEGY	5	PT/A	PRE	A	99 a	99 a	99 a	98 a	1.4 a
SANDEA +	0.5	OZ/A	POST	B					
NIS	0.4	PT/A	POST	B					
STRATEGY	5	PT/A	PRE	A	99 a	99 a	99 a	99 a	1.3 a
SANDEA +	0.66	OZ/A	POST	B					
NIS	0.4	PT/A	POST	B					
COMMAND	1.3	PT/A	PRE	A	99 a	99 a	99 a	93 ab	1.3 a
SANDEA +	0.5	OZ/A	POST	B					
NIS +	0.4	PT/A	POST	B					
POAST +	1.25	PT/A	POST	B					
COC	1	QT/A	POST	B					
COMMAND	1.3	PT/A	PRE	A	99 a	99 a	99 a	95 ab	1.5 a
SANDEA +	0.66	OZ/A	POST	B					
NIS	0.4	PT/A	POST	B					
POAST +	1.25	PT/A	POST	B					
COC	1	QT/A	POST	B					
COMMAND	1.3	PT/A	PRE	A	99 a	99 a	99 a	95 ab	2.1 a
SANDEA +	0.66	OZ/A	POST	B					
POAST +	1.25	PT/A	POST	B					
COC	1	QT/A	POST	B					
COMMAND	2.66	PT/A	PRE	A	99 a	99 a	99 a	95 ab	1.6 a
LSD (P=.05)					0	0	0	11.1	1.33
CV					0	0	0	7.91	45.68

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

CURCURBITS- PERFORMANCE OF STRATEGY AND SANDEA

Trial ID: CURCURFRE 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									POROL
Crop Code					CUMSA	CUMHY	CUMHY	CUMHY	ALL
Part Rated					FRUIT	FRUIT	FRUIT	FRUIT	WEED
Rating Data Type					TOT.CULL	YLD.MKTBLE	YLD.GREEN	YLD.CULL	CONTROL
Rating Unit					TONS/A.	TONS/A.	TONS/A.	TONS/A.	PERCENT
Rating Date					8/8/2002	9/11/2002	9/11/2002	9/11/2002	10/8/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	44	47	50	53	54
WEEDY CONTROL					1.1 a	0.4 ab	1 ab	0.4 abc	0 c
WEED FREE CONTROL					0.6 abc	0.3 b	0.4 b	0.1 c	99 a
STRATEGY	5	PT/A	PRE	A	0.6 abc	1.5 ab	0.7 ab	0.2 bc	75 ab
STRATEGY	5	PT/A	PRE	A	0.9 ab	0.7 ab	1.2 ab	0.3 abc	60 b
ALANAP	5	QT/A	PRE	A					
STRATEGY	5	PT/A	PRE	A	0.3 bc	1.8 a	0.6 b	0.9 ab	93 a
SANDEA +	0.5	OZ/A	POST	B					
NIS	0.4	PT/A	POST	B					
STRATEGY	5	PT/A	PRE	A	0.6 abc	1 ab	2.1 a	0.3 abc	95 a
SANDEA +	0.66	OZ/A	POST	B					
NIS	0.4	PT/A	POST	B					
COMMAND	1.3	PT/A	PRE	A	0.5 abc	1 ab	0.9 ab	0.2 bc	81 ab
SANDEA +	0.5	OZ/A	POST	B					
NIS +	0.4	PT/A	POST	B					
POAST +	1.25	PT/A	POST	B					
COC	1	QT/A	POST	B					
COMMAND	1.3	PT/A	PRE	A	0.2 c	0.9 ab	0.8 ab	0.1 bc	73 ab
SANDEA +	0.66	OZ/A	POST	B					
NIS	0.4	PT/A	POST	B					
POAST +	1.25	PT/A	POST	B					
COC	1	QT/A	POST	B					
COMMAND	1.3	PT/A	PRE	A	0.4 bc	1.2 ab	1.7 ab	0.1 bc	73 ab
SANDEA +	0.66	OZ/A	POST	B					
POAST +	1.25	PT/A	POST	B					
COC	1	QT/A	POST	B					
COMMAND	2.66	PT/A	PRE	A	0.2 c	0.8 ab	1.3 ab	1 a	78 ab
LSD (P=.05)					0.57	1.36	1.48	0.75	31.6
CV					62.91	82.83	79.26	125.28	25.35

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

CURCURBITS- PERFORMANCE OF STRATEGY AND SANDEA

Trial ID: CURCURFRE 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					A.GRASS	SOLPT			
Crop Code					ALL	ALL	CUUPE	CUUPE	CUUPE
Part Rated					WEED	WEED	FRUIT	FRUIT	FRUIT
Rating Data Type					CONTROL	CONTROL	YLD.MKTBLE	YLD.GREEN	YLD.CULL
Rating Unit					PERCENT	PERCENT	TONS/A.	TONS/A.	TONS/A.
Rating Date					10/8/2002	10/8/2002	10/18/2002	10/18/2002	10/18/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	55	56	59	62	65
WEEDY CONTROL					0 b	0 d	11.2 ab	2.5 a	0.7 ab
WEED FREE CONTROL					99 a	99 a	6.7 b	1.9 a	4 a
STRATEGY	5	PT/A	PRE	A	83 a	60 abc	17.4 a	4.4 a	0.2 b
STRATEGY	5	PT/A	PRE	A	66 a	83 ab	11.1 ab	6.9 a	0.8 ab
ALANAP	5	QT/A	PRE	A					
STRATEGY	5	PT/A	PRE	A	95 a	88 a	17.1 a	5.8 a	0 b
SANDEA +	0.5	OZ/A	POST	B					
NIS	0.4	PT/A	POST	B					
STRATEGY	5	PT/A	PRE	A	98 a	93 a	16.9 a	2.7 a	0 b
SANDEA +	0.66	OZ/A	POST	B					
NIS	0.4	PT/A	POST	B					
COMMAND	1.3	PT/A	PRE	A	89 a	37 bcd	17.4 a	8.4 a	0.9 ab
SANDEA +	0.5	OZ/A	POST	B					
NIS +	0.4	PT/A	POST	B					
POAST +	1.25	PT/A	POST	B					
COC	1	QT/A	POST	B					
COMMAND	1.3	PT/A	PRE	A	99 a	80 ab	7.4 b	9 a	1 ab
SANDEA +	0.66	OZ/A	POST	B					
NIS	0.4	PT/A	POST	B					
POAST +	1.25	PT/A	POST	B					
COC	1	QT/A	POST	B					
COMMAND	1.3	PT/A	PRE	A	96 a	30 cd	14.6 ab	7.5 a	1.6 ab
SANDEA +	0.66	OZ/A	POST	B					
POAST +	1.25	PT/A	POST	B					
COC	1	QT/A	POST	B					
COMMAND	2.66	PT/A	PRE	A	99 a	83 ab	11 ab	9.4 a	0.9 ab
LSD (P=.05)					35	49.9	8.88	9.32	3.44
CV					24.74	44.65	39.54	93.03	196.9

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

ONIONS, GREEN- WEED CONTROL WITH PROWL

Trial ID: PROWLONIONC 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Celeryville, Ohio Investigator: Dr. Douglas J. Doohan

COOPERATOR/LANDOWNER

Cooperator: Rick Callender, Mgr. Country: USA
Org: OARDC, Muck Crops Branch Phone No: 419-935-1201
Address 1: 4875 S.R.103 South
City: Celeryville
State/Prov: Ohio
Postal Code: 44890

Conducted Under GLP (Y/N): N Conducted Under GEP (Y/N): N

Objective: To evaluate weed control and onion injury using a variety of rates and timings of "Prowl".

CROP AND WEED DESCRIPTION

Weed	Code	Common Name	Scientific Name
1	AMAXX	pigweed species	Amaranthus spp.
2	POROL	common purslane	Portulaca oleracea L.
3	DIGSA	large crabgrass	Digitaria sanguinalis (L.)Scop.

Crop 1: ALLCE green onions Variety: Ishikura
Planting Date: 06/25/02 Planting Method: conventional
Rate: 15 seeds/foot Depth: 0.50 in
Row Spacing: 16 inch Seed Bed: conventional
Emergence Date: 07/06/02

SITE AND DESIGN

Plot Width, Unit: 8 FT Plot Length, Unit: 30 FT Reps: 4
Site Type: Level Field
Tillage Type: Conventional Study Design: RANDOMIZED COMPLETE BLOCK

MAINTENANCE

Field Prep./Maintenance: Plowed 4/19/02. Disked, rolled, and leveled prior to planting. Fertilized with (17-17-17)@500#/A. Irrigation applied on 6/26 @.8", and on 7/16 @ 1".

SOIL DESCRIPTION

% Sand: 63.7 % OM: 70 Texture: muck
% Silt: 30.7 pH: 5.62 Soil Name: Linwood Muck
% Clay: 5.0 Fert. Level: high

APPLICATION DESCRIPTION

	A	B	C	D
Applicatic	7/1/2002	7/11/2002	7/19/2002	8/8/2002
Time of D	10-11 AM	9-10 AM	9-10 AM	9-10 AM
Applicatic	SPRAY	SPRAY	SPRAY	SPRAY
Applicatic	PRE	LOOP	EPOST	LATE POST
Applic. Pl	BDCST.	BDCST.	BDCST.	BDCST.
Air Temp.	75 F	72 F	76 F	73 F
% Relative Humidit	39			63
Wind Velc	2 MPH	7 MPH	3 MPH	4 MPH
Dew Pres	N	N	N	N
% Cloud (	20	80	40	40

CROP STAGE AT EACH APPLICATION

	A	B	C	D
Crop 1 Co	ALLCE PRE	ALLCE LOOP	ALLCE EPOST	ALLCE LPOST
Stage Sc	.	LOOP	2 LF.	3 LF.
Height, I	0. .	1 IN.	3 IN.	6 IN.

WEED STAGE AT EACH APPLICATION

	A	B	C	D
Weed 1 C	AMAXX PRI	AMAXX LOOP	AMAXX EPOST	AMAXX LPOST
Stage Sc	.	0-1"	2-6"	24-30"
Density,	. .	MED	MED	MED.
Weed 2 C	POROL PRE	POROL LOOP	POROL EPOST	POROL LPOST
Stage Sc	.	0-.5"DIA	1-3" DIA.	4-8" DIA.
Density,	. .	MED	MED	MED.
Weed 3 C	DIGSA PRE	DIGSA LOOP	DIGSA EPOST	DIGSA LPOST
Stage Sc	.	0-.5 "	1-3"	4-8"
Density,	. .	MED	MED	MED

APPLICATION EQUIPMENT

	A	B	C	D
Appl. Equ	CO2 BACKI	CO2 BACKP	CO2 BACKP	CO2 BACKP
Operating	35 PSI	35 PSI	35 PSI	35 PSI
Nozzle Ty	FLAT FAN	FLAT FAN	FLAT FAN	FLAT FAN
Nozzle Si	8002VS	8002VS	8002VS	8002VS
Nozzle Sp	12 IN.	12 IN.	12 IN.	12 IN.
Nozzles/I	4	4	4	4
Band Wid	48 IN.	48 IN.	48 IN.	48 IN.
Boom Hei	18 IN.	18 IN.	18 IN.	18 IN.
Ground S	4 MPH	4 MPH	4 MPH	4 MPH

The Ohio State University

ONIONS, GREEN- WEED CONTROL WITH PROWL

Trial ID: PROWLONIONC 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Celeryville, Ohio Investigator: Dr. Douglas J. Doohan

Trial Comments

Weed pressure was intense this year, consisting primarily of pigweeds and purslane.
The "weed free" plots were not weeded on time; very few onions were present in weed-free plots.
Weed counts reflect the sum of two (.25 m) quadrats and purslane/pigweed plants alive and dead.
Onion stand counts reflect average of three, 5' lengths of row.
Weed ratings based on: 0%= no control and 100%= complete weed control of that species.
Yields represent five linear feet of row/plot, and are weighed in kg. Plots without yields indicate poor weed control and subsequent onion loss.

The Ohio State University

ONIONS, GREEN- WEED CONTROL WITH PROWL

Trial ID: PROWLONIONC 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Celeryville, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					AGRASS	AMAXX	POROL	AGRASS
Crop Code					ALLCE	ALLCE	ALLCE	ALLCE
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					CONTROL	CONTROL	CONTROL	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/10/2002	7/10/2002	7/10/2002	7/17/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	1	2	3	4
WEEDY CONTROL					0 b	0 d	0 c	0 c
HAND WEEDED CONTROL					0 b	0 d	0 c	0 c
PROWL	3.2	PT/A	PRE	A	95 a	79 abc	56 b	95 a
PROWL	3.2	PT/A	EPOST	C				
PROWL	4	PT/A	PRE	A	94 a	84 ab	83 a	95 a
PROWL	4	PT/A	EPOST	C				
PROWL	4.8	PT/A	PRE	A	97 a	78 bc	76 a	97 a
PROWL	4.8	PT/A	EPOST	C				
PROWL	3.2	PT/A	LOOP	B				49 b
PROWL	3.2	PT/A	EPOST	C				
PROWL	4	PT/A	LOOP	B				60 b
PROWL	4	PT/A	EPOST	C				
PROWL	4.8	PT/A	LOOP	B				48 b
PROWL	4.8	PT/A	EPOST	C				
PROWL	3.2	PT/A	PRE	A	98 a	88 a	51 b	96 a
PROWL	3.2	PT/A	EPOST	C				
PROWL	3.2	PT/A	LPOST	D				
PROWL	4	PT/A	PRE	A	93 a	80 abc	75 a	93 a
PROWL	4	PT/A	EPOST	C				
PROWL	4	PT/A	LPOST	D				
PROWL	4.8	PT/A	PRE	A	95 a	73 c	78 a	72 ab
PROWL	4.8	PT/A	EPOST	C				
PROWL	4.8	PT/A	LPOST	D				
PROWL	3.2	PT/A	LOOP	B				59 b
PROWL	3.2	PT/A	EPOST	C				
PROWL	3.2	PT/A	LPOST	D				
PROWL	4	PT/A	LOOP	B				53 b
PROWL	4	PT/A	EPOST	C				
PROWL	4	PT/A	LPOST	D				
PROWL	4.8	PT/A	LOOP	B				60 b
PROWL	4.8	PT/A	EPOST	C				
PROWL	4.8	PT/A	LPOST	D				
LSD (P=.05)					7.2	9.9	10.3	32.6
CV					6.82	11.17	13.41	36.56

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

ONIONS, GREEN- WEED CONTROL WITH PROWL

Trial ID: PROWLONIONC 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Celeryville, Ohio Investigator: Dr. Douglas J. Doohan

Treatment Name	Product Rate	Product Rate Unit	Grow Stg	AMAXX ALLCE WEED CONTROL PERCENT 7/17/2002	POROL ALLCE WEED CONTROL PERCENT 7/17/2002	ALLCE ONION AV.STAND COUNT/5' 7/17/2002	AMAXX ALLCE WEED COUNT/PLOT ALIVE 7/17/2002
				5	6	7	8
WEEDY CONTROL				0 d	0 f	0 d	4 abc
HAND WEEDED CONTROL				0 d	0 f	5 bc	1 bc
PROWL	3.2	PT/A	PRE	56 abc	20 de	8 a	1 bc
PROWL	3.2	PT/A	EPOST				
PROWL	4	PT/A	PRE	83 ab	79 a	7 ab	1 abc
PROWL	4	PT/A	EPOST				
PROWL	4.8	PT/A	PRE	49 c	84 a	6 abc	2 abc
PROWL	4.8	PT/A	EPOST				
PROWL	3.2	PT/A	LOOP	55 abc	33 cd	6 abc	1 bc
PROWL	3.2	PT/A	EPOST				
PROWL	4	PT/A	LOOP	46 c	54 b	4 c	5 a
PROWL	4	PT/A	EPOST				
PROWL	4.8	PT/A	LOOP	40 c	39 bc	7 ab	4 ab
PROWL	4.8	PT/A	EPOST				
PROWL	3.2	PT/A	PRE	84 a	8 ef	0 d	1 c
PROWL	3.2	PT/A	EPOST				
PROWL	3.2	PT/A	LPOST				
PROWL	4	PT/A	PRE	70 abc	80 a	0 d	2 abc
PROWL	4	PT/A	EPOST				
PROWL	4	PT/A	LPOST				
PROWL	4.8	PT/A	PRE	53 bc	76 a	0 d	2 abc
PROWL	4.8	PT/A	EPOST				
PROWL	4.8	PT/A	LPOST				
PROWL	3.2	PT/A	LOOP	55 abc	35 cd	0 d	2 abc
PROWL	3.2	PT/A	EPOST				
PROWL	3.2	PT/A	LPOST				
PROWL	4	PT/A	LOOP	63 abc	40 bc	0 d	1 abc
PROWL	4	PT/A	EPOST				
PROWL	4	PT/A	LPOST				
PROWL	4.8	PT/A	LOOP	66 abc	35 cd	0 d	2 abc
PROWL	4.8	PT/A	EPOST				
PROWL	4.8	PT/A	LPOST				
				31.2	18.5	2.7	3.7
				42.57	31.19	62.84	130.29

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

ONIONS, GREEN- WEED CONTROL WITH PROWL

Trial ID: PROWLONIONC 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Celeryville, Ohio Investigator: Dr. Douglas J. Doohan

Treatment Name	Product Rate	Product Rate Unit	Grow Stg	AMAXX ALLCE WEED COUNT/PLOT DEAD 7/17/2002	POROL ALLCE WEED COUNT/PLOT ALIVE 7/17/2002	POROL ALLCE WEED COUNT/PLOT DEAD 7/17/2002	ALLCE PLANT CHLOROSIS PERCENT 8/8/2002
				9	10	11	12
WEEDY CONTROL				0 b	40 ab	0 c	0 a
HAND WEEDED CONTROL				0 b	36 ab	0 c	0 a
PROWL	3.2	PT/A	PRE	0 b	34 ab	1 c	0 a
PROWL	3.2	PT/A	EPOST				
PROWL	4	PT/A	PRE	1 a	15 de	17 b	0 a
PROWL	4	PT/A	EPOST				
PROWL	4.8	PT/A	PRE	0 ab	13 e	31 a	0 a
PROWL	4.8	PT/A	EPOST				
PROWL	3.2	PT/A	LOOP	0 b	32 abc	0 c	0 a
PROWL	3.2	PT/A	EPOST				
PROWL	4	PT/A	LOOP	0 b	25 b-e	0 c	0 a
PROWL	4	PT/A	EPOST				
PROWL	4.8	PT/A	LOOP	0 b	27 a-e	1 c	0 a
PROWL	4.8	PT/A	EPOST				
PROWL	3.2	PT/A	PRE	0 b	35 ab	2 c	0 a
PROWL	3.2	PT/A	EPOST				
PROWL	3.2	PT/A	LPOST				
PROWL	4	PT/A	PRE	0 b	17 cde	32 a	0 a
PROWL	4	PT/A	EPOST				
PROWL	4	PT/A	LPOST				
PROWL	4.8	PT/A	PRE	0 b	16 cde	32 a	0 a
PROWL	4.8	PT/A	EPOST				
PROWL	4.8	PT/A	LPOST				
PROWL	3.2	PT/A	LOOP	0 b	31 a-d	0 c	0 a
PROWL	3.2	PT/A	EPOST				
PROWL	3.2	PT/A	LPOST				
PROWL	4	PT/A	LOOP	0 b	42 a	0 c	0 a
PROWL	4	PT/A	EPOST				
PROWL	4	PT/A	LPOST				
PROWL	4.8	PT/A	LOOP	0 b	31 a-d	0 c	0 a
PROWL	4.8	PT/A	EPOST				
PROWL	4.8	PT/A	LPOST				
				0.3	16.3	5	0
				372.56	40.77	42.61	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

ONIONS, GREEN- WEED CONTROL WITH PROWL

Trial ID: PROWLONIONC 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Celeryville, Ohio Investigator: Dr. Douglas J. Doohan

Treatment Name	Product Rate	Product Rate Unit	Grow Stg	ALLCE PLANT INJURY PERCENT 8/8/2002	ALLCE PLANT STUNT PERCENT 8/8/2002	AMAXX ALLCE WEED CONTROL PERCENT 8/8/2002	POROL ALLCE WEED CONTROL PERCENT 8/8/2002
				13	14	15	16
WEEDY CONTROL				0 a	0 a	0 d	0 d
HAND WEEDED CONTROL				0 a	0 a	0 d	0 d
PROWL	3.2	PT/A	PRE	0 a	0 a	29 bc	40 bc
PROWL	3.2	PT/A	EPOST				
PROWL	4	PT/A	PRE	0 a	0 a	33 b	71 ab
PROWL	4	PT/A	EPOST				
PROWL	4.8	PT/A	PRE	0 a	0 a	28 bc	91 a
PROWL	4.8	PT/A	EPOST				
PROWL	3.2	PT/A	LOOP	0 a	0 a	28 bc	11 cd
PROWL	3.2	PT/A	EPOST				
PROWL	4	PT/A	LOOP	0 a	0 a	13 bcd	38 bcd
PROWL	4	PT/A	EPOST				
PROWL	4.8	PT/A	LOOP	0 a	0 a	14 bcd	40 bc
PROWL	4.8	PT/A	EPOST				
PROWL	3.2	PT/A	PRE	0 a	0 a	70 a	14 cd
PROWL	3.2	PT/A	EPOST				
PROWL	3.2	PT/A	LPOST				
PROWL	4	PT/A	PRE	0 a	0 a	26 bc	73 ab
PROWL	4	PT/A	EPOST				
PROWL	4	PT/A	LPOST				
PROWL	4.8	PT/A	PRE	0 a	0 a	10 bcd	67 ab
PROWL	4.8	PT/A	EPOST				
PROWL	4.8	PT/A	LPOST				
PROWL	3.2	PT/A	LOOP	0 a	0 a	5 cd	44 bc
PROWL	3.2	PT/A	EPOST				
PROWL	3.2	PT/A	LPOST				
PROWL	4	PT/A	LOOP	0 a	0 a	9 bcd	10 cd
PROWL	4	PT/A	EPOST				
PROWL	4	PT/A	LPOST				
PROWL	4.8	PT/A	LOOP	0 a	0 a	13 bcd	24 cd
PROWL	4.8	PT/A	EPOST				
PROWL	4.8	PT/A	LPOST				
				0	0	24.5	37.6
				0	0	87.33	70.48

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

ONIONS, GREEN- WEED CONTROL WITH PROWL

Trial ID: PROWLONIONC 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Celeryville, Ohio Investigator: Dr. Douglas J. Doohan

Treatment Name	Product Rate	Product Rate Unit	Grow Stg	DIGSA ALLCE WEED CONTROL PERCENT 8/8/2002	AMAXX ALLCE WEED CONTROL PERCENT 8/21/2002	POROL ALLCE WEED CONTROL PERCENT 8/21/2002	DIGSA ALLCE WEED CONTROL PERCENT 8/21/2002
				17	18	19	20
WEEDY CONTROL				0 b	0 d	0 e	0 d
HAND WEEDED CONTROL				0 b	0 d	0 e	0 d
PROWL	3.2	PT/A	PRE	69 a	61 ab	43 cd	91 a
PROWL	3.2	PT/A	EPOST				
PROWL	4	PT/A	PRE	69 a	63 ab	49 bcd	85 ab
PROWL	4	PT/A	EPOST				
PROWL	4.8	PT/A	PRE	71 a	40 bc	71 abc	88 ab
PROWL	4.8	PT/A	EPOST				
PROWL	3.2	PT/A	LOOP	0 b	41 bc	25 de	1 d
PROWL	3.2	PT/A	EPOST				
PROWL	4	PT/A	LOOP	0 b	15 cd	50 bcd	14 cd
PROWL	4	PT/A	EPOST				
PROWL	4.8	PT/A	LOOP	49 ab	14 cd	54 bcd	36 c
PROWL	4.8	PT/A	EPOST				
PROWL	3.2	PT/A	PRE	67 a	84 a	58 a-d	95 a
PROWL	3.2	PT/A	EPOST				
PROWL	3.2	PT/A	LPOST				
PROWL	4	PT/A	PRE	72 a	69 ab	78 ab	64 b
PROWL	4	PT/A	EPOST				
PROWL	4	PT/A	LPOST				
PROWL	4.8	PT/A	PRE	55 a	41 bc	89 a	73 ab
PROWL	4.8	PT/A	EPOST				
PROWL	4.8	PT/A	LPOST				
PROWL	3.2	PT/A	LOOP	25 ab	46 b	40 cd	5 d
PROWL	3.2	PT/A	EPOST				
PROWL	3.2	PT/A	LPOST				
PROWL	4	PT/A	LOOP	0 b	60 ab	66 abc	5 d
PROWL	4	PT/A	EPOST				
PROWL	4	PT/A	LPOST				
PROWL	4.8	PT/A	LOOP	0 b	43 bc	55 bcd	4 d
PROWL	4.8	PT/A	EPOST				
PROWL	4.8	PT/A	LPOST				
				53.1	29.5	32.8	26.7
				109.32	50.2	47.55	46.63

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

ONIONS, GREEN- WEED CONTROL WITH PROWL

Trial ID: PROWLONIONC 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Celeryville, Ohio Investigator: Dr. Douglas J. Doohan

Treatment Name	Product Rate	Product Rate Unit	Grow Stg	ALLCE BULB YIELD PLANT # 8/21/2002 21	ALLCE BULB YIELD/5' LBS./A. 8/21/2002 23
WEEDY CONTROL				0 c	0 c
HAND WEEDED CONTROL				0 c	0 c
PROWL	3.2	PT/A	PRE	0 c	0 c
PROWL	3.2	PT/A	EPOST		
PROWL	4	PT/A	PRE	18 b	617.8 ab
PROWL	4	PT/A	EPOST		
PROWL	4.8	PT/A	PRE	22 ab	681.8 ab
PROWL	4.8	PT/A	EPOST		
PROWL	3.2	PT/A	LOOP	0 c	0 c
PROWL	3.2	PT/A	EPOST		
PROWL	4	PT/A	LOOP	0 c	0 c
PROWL	4	PT/A	EPOST		
PROWL	4.8	PT/A	LOOP	0 c	0 c
PROWL	4.8	PT/A	EPOST		
PROWL	3.2	PT/A	PRE	0 c	0 c
PROWL	3.2	PT/A	EPOST		
PROWL	3.2	PT/A	LPOST		
PROWL	4	PT/A	PRE	30 a	896.3 a
PROWL	4	PT/A	EPOST		
PROWL	4	PT/A	LPOST		
PROWL	4.8	PT/A	PRE	22 b	470.6 b
PROWL	4.8	PT/A	EPOST		
PROWL	4.8	PT/A	LPOST		
PROWL	3.2	PT/A	LOOP	0 c	0 c
PROWL	3.2	PT/A	EPOST		
PROWL	3.2	PT/A	LPOST		
PROWL	4	PT/A	LOOP	0 c	0 c
PROWL	4	PT/A	EPOST		
PROWL	4	PT/A	LPOST		
PROWL	4.8	PT/A	LOOP	0 c	0 c
PROWL	4.8	PT/A	EPOST		
PROWL	4.8	PT/A	LPOST		
				7.4	295.65
				78.55	108.62

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

ONIONS, DRY- EVALUATION OF STARANE

Trial ID: STARANONIONC 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Celeryville, Ohio Investigator: Dr. Douglas J. Doohan

COOPERATOR/LANDOWNER

Cooperator: Rick Callender, Mgr. Country: USA
Org: OARDC, Muck Crops Branch Phone No: 419-935-1201
Address 1: 4875 S.R.103 South Fax No: 419-935-0019
City: Celeryville
State/Prov: Ohio
Postal Code: 44890

Conducted Under GLP (Y/N): N Conducted Under GEP (Y/N): N

Objective: To assess the post-emergence activity/selectivity of Starane for broadleaf control in bulb onions.

CROP AND WEED DESCRIPTION

Weed	Code	Common Name	Scientific Name
1	POROL	common purslane	Portulaca oleracea L.
2	AMARE	redroot pigweed	Amaranthus retroflexus
3	AMAXX	pigweed species	Amaranth spp.
4	AGRASS	foxtail and crabgrass species	Setaria spp., Digitaria spp.
5	POLPY	Pennsylvania smartweed	Polygonum pensylvanicum L.
6	AMABL	prostrate pigweed	Amaranthus blitoides S.Wats.

Crop 1: ALLCE DRY BULB ONION Variety: BURGOS
Planting Date: 06/18/02 Planting Method: CONVENTIONAL
Rate: 15 SEEDS/FT. Depth: 0.50 IN
Row Spacing: 18 IN. Seed Bed: CONVENTIONAL
Emergence Date: 06/25/02

SITE AND DESIGN

Plot Width, Unit: 6 FT Plot Length, Unit: 30 FT Reps: 4
Site Type: LEVEL FIELD
Tillage Type: CONVENTIONAL Study Design: RANDOMIZED COMPLETE BLOCK

MAINTENANCE

Field Prep./Maintenance: Plowed 4/19/02; disced, rolled and leveled prior to planting. Fertilized with 17-17-17 @500#/A. Irrigation applied on 6/25 @ .8", and on 7/16 @1".

SOIL DESCRIPTION

% Sand: 63.7 % OM: 70 Texture: MUCK
% Silt: 30.7 pH: 5.62 Soil Name: LINWOOD MUCK
% Clay: 5.0 Fert. Level: HIGH

APPLICATION DESCRIPTION

	A	B	C	D
Application Date:		7/1/2002	7/11/2002	8/8/2002
Time of D	1-2 PM	10-11AM	9-10AM	10-11AM
Applicatic	SPRAY	SPRAY	SPRAY	SPRAY
Applicatic	pre	2 leaf	3 leaf	6 leaf
Applic. Pl	BDCST.	BDCST.	BDCST.	BDCST.
Air Temp.	78 F	75 F	72 F	73 F
% Relativ	41	70	39	63
Wind Velc	2 MPH	3 MPH	7 MPH	3 MPH
% Cloud (	20	30	25	30

CROP STAGE AT EACH APPLICATION

	A	B	C	D
Crop 1 Co	ALLCE PRE	ALLCE 2 LF.	ALLCE 3 LF.	ALLCE 6 LF.
Stage Sc	NONE	VEGETAT.	VEGETAT.	VEGETAT.
Height, I	0 IN.	2 IN.	5 IN.	10 IN.

WEED STAGE AT EACH APPLICATION

	A	B	C
Weed 1 C	POROL 2 leaf	POROL 3 leaf	POROL 6 leaf
Stage Sc	0-2 in.	2-4 in.	4-6 in.
Density,	med.	med.	med.
Weed 2 C	AMARE 2 leaf	AMARE 3 leaf	AMARE 6 leaf
Stage Sc	0-2 in.	2-4 in.	4-6 in.
Density,	low	low	low
Weed 3 C	AMAXX 2 leaf	AMAXX 3 leaf	AMAXX 6 leaf
Stage Sc	0-2 in.	2-4 in.	4-6 in.
Density,	high	high	high
Weed 4 C	AGRAS 2 leaf	AGRAS 3 leaf	AGRAS 6 leaf
Stage Sc	0-2 in.	2-4 in.	4-6 in.
Density,	low	low	low
Weed 5 C	POLPY 2 leaf	POLPY 3 leaf	POLPY 6 leaf
Stage Sc	0-2 in.	2-4 in.	4-6 in.
Density,	low	low	low
Weed 6 C	AMABL 2 leaf	AMABL 3 leaf	AMABL
Stage Sc	0-2 in.	2-4 in.	4-6 in.
Density,	high	high	high

APPLICATION EQUIPMENT

	A	B	C	D
Appl. Equ	CO2 BKPK.	CO2 BKPK.	CO2 BKPK.	CO2 BKPK.
Operating	35	35	35	35
Nozzle Ty	FLAT FAN	FLAT FAN	FLAT FAN	FLAT FAN
Nozzle Si:	8002 VS	8002 VS	8002 VS	8002 VS
Nozzle Sp	12 IN	12 IN	12 IN	12 IN
Nozzles/I	4	4	4	4
Band Wid	48 IN	48 IN	48 IN	48 IN
Boom Hei	18 IN	18 IN	18 IN	18 IN
Ground S	4 MPH	4 MPH	4 MPH	4 MPH
Spray Vol	20 GPA	20 GPA	20 GPA	20 GPA
Propellan	CO2	CO2	CO2	CO2

The Ohio State University

ONIONS, DRY- EVALUATION OF STARANE

Trial ID: STARANONIONC 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Celeryville, Ohio Investigator: Dr. Douglas J. Doohan

Trial Comments

Starane was very active on common purslane, (Porol), and resulted in severe epinasty and stunting within a few hours of application. When Starane was applied in a tank- mix with Buctiril and Poast, severe antagonism of the Starane effect on purslane was observed, to the extent that no control of the species was obtained. Because of the weed competition, the onions were outcompeted, resulting in yield loss. Biomass was taken using two (12" x 12") quadrats per plot. Weed ratings based on: (0% = no control and 100% = complete control) of that species.

The Ohio State University

ONIONS, DRY- EVALUATION OF STARANE

Trial ID: STARANONIONC 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Celeryville, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code						AMAXX	A.GRASS	POROL
Crop Code					ALLCE	ALLCE	ALLCE	ALLCE
Part Rated					PLANT	WEED	WEED	WEED
Rating Data Type					INJURY	CONTROL	CONTROL	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/24/2002	6/24/2002	6/24/2002	6/24/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	1	2	3	4
DUAL MAGNUM	1.33	PT/A	PRE	A	0 a	73 a	99 a	59 a
STARANE +	0.336	PT/A	3 LEAF	C				
COC	1.6	PT/A	3 LEAF	C				
STARANE +	0.336	PT/A	6 LEAF	D				
COC	1.6	PT/A	6 LEAF	D				
DUAL MAGNUM	1.33	PT/A	PRE	A	0 a	69 a	99 a	63 a
BUCTRIL +	0.6	PT/A	3 LEAF	C				
COC	1.6	PT/A	3 LEAF	C				
BUCTRIL +	0.6	PT/A	6 LEAF	D				
COC	1.6	PT/A	6 LEAF	D				
STARANE +	0.336	PT/A	3 LEAF	C	0 a	0 b	0 b	0 b
BUCTRIL +	0.6	PT/A	3 LEAF	C				
POAST +	2.67	PT/A	3 LEAF	C				
COC	1.6	PT/A	3 LEAF	C				
STARANE +	0.336	PT/A	6 LEAF	D				
BUCTRIL +	0.6	PT/A	6 LEAF	D				
POAST +	2.67	PT/A	6 LEAF	D				
COC	1.6	PT/A	6 LEAF	D				
DUAL MAGNUM	1.33	PT/A	PRE	A	0 a	63 a	99 a	68 a
GOAL +	0.19	PT/A	2-LEAF	B				
POAST	1.5	PT/A	2-LEAF	B				
UNTREATED CONTROL					0 a	0 b	0 b	0 b
LSD (P=.05)					0	17.9	0	14.1
CV					0	28.56	0	24.24

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

ONIONS, DRY- EVALUATION OF STARANE

Trial ID: STARANONIONC 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Celeryville, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code						AMAXX	A.GRASS	POROL
Crop Code					ALLCE	ALLCE	ALLCE	ALLCE
Part Rated					PLANT	WEED	WEED	WEED
Rating Data Type					INJURY	WEED	WEED	WEED
Rating Unit					PERCENT	CONTROL	CONTROL	CONTROL
Rating Date					7/11/2002	7/11/2002	7/11/2002	7/11/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	5	6	7	8
DUAL MAGNUM	1.33	PT/A	PRE	A	0 a	64 a	99 a	64 a
STARANE +	0.336	PT/A	3 LEAF	C				
COC	1.6	PT/A	3 LEAF	C				
STARANE +	0.336	PT/A	6 LEAF	D				
COC	1.6	PT/A	6 LEAF	D				
DUAL MAGNUM	1.33	PT/A	PRE	A	0 a	23 b	98 a	25 b
BUCTRIL +	0.6	PT/A	3 LEAF	C				
COC	1.6	PT/A	3 LEAF	C				
BUCTRIL +	0.6	PT/A	6 LEAF	D				
COC	1.6	PT/A	6 LEAF	D				
STARANE +	0.336	PT/A	3 LEAF	C	0 a	0 c	0 b	0 c
BUCTRIL +	0.6	PT/A	3 LEAF	C				
POAST +	2.67	PT/A	3 LEAF	C				
COC	1.6	PT/A	3 LEAF	C				
STARANE +	0.336	PT/A	6 LEAF	D				
BUCTRIL +	0.6	PT/A	6 LEAF	D				
POAST +	2.67	PT/A	6 LEAF	D				
COC	1.6	PT/A	6 LEAF	D				
DUAL MAGNUM	1.33	PT/A	PRE	A	0 a	66 a	98 a	51 a
GOAL +	0.19	PT/A	2-LEAF	B				
POAST	1.5	PT/A	2-LEAF	B				
UNTREATED CONTROL					0 a	0 c	0 b	0 c
LSD (P=.05)					0	21.6	2	17.6
CV					0	45.96	2.23	40.69

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

ONIONS, DRY- EVALUATION OF STARANE

Trial ID: STARANONIONC 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Celeryville, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code						AMARE	AMABL	A.GRASS
Crop Code					ALLCE	ALLCE	ALLCE	ALLCE
Part Rated					PLANT	WEED	WEED	WEED
Rating Data Type					INJURY	WEED	WEED	WEED
Rating Unit					PERCENT	CONTROL	CONTROL	CONTROL
Rating Date					7/17/2002	7/17/2002	7/17/2002	7/17/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	9	10	11	12
DUAL MAGNUM	1.33	PT/A	PRE	A	0 a	19 a	0 a	0 c
STARANE +	0.336	PT/A	3 LEAF	C				
COC	1.6	PT/A	3 LEAF	C				
STARANE +	0.336	PT/A	6 LEAF	D				
COC	1.6	PT/A	6 LEAF	D				
DUAL MAGNUM	1.33	PT/A	PRE	A	0 a	33 a	24 a	23 b
BUCTRIL +	0.6	PT/A	3 LEAF	C				
COC	1.6	PT/A	3 LEAF	C				
BUCTRIL +	0.6	PT/A	6 LEAF	D				
COC	1.6	PT/A	6 LEAF	D				
STARANE +	0.336	PT/A	3 LEAF	C	0 a	14 a	4 a	15 b
BUCTRIL +	0.6	PT/A	3 LEAF	C				
POAST +	2.67	PT/A	3 LEAF	C				
COC	1.6	PT/A	3 LEAF	C				
STARANE +	0.336	PT/A	6 LEAF	D				
BUCTRIL +	0.6	PT/A	6 LEAF	D				
POAST +	2.67	PT/A	6 LEAF	D				
COC	1.6	PT/A	6 LEAF	D				
DUAL MAGNUM	1.33	PT/A	PRE	A	0 a	11 a	8 a	94 a
GOAL +	0.19	PT/A	2-LEAF	B				
POAST	1.5	PT/A	2-LEAF	B				
UNTREATED CONTROL					0 a	0 a	0 a	0 c
LSD (P=.05)					0	33.9	27.2	13.4
CV					0	144.38	251.95	33.08

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

ONIONS, DRY- EVALUATION OF STARANE

Trial ID: STARANONIONC 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Celeryville, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					POROL	AMARE	AMARE	AMABL
Crop Code					ALLCE	ALLCE	ALLCE	ALLCE
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					WEED	BIOMASS	BIOMASS	BIOMASS
Rating Unit					CONTROL	NUMBER	WT./GRAM	NUMBER
Rating Date					7/17/2002	7/19/2002	7/19/2002	7/19/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	13	14	15	16
DUAL MAGNUM	1.33	PT/A	PRE	A	70 a	2 ab	167.1 a	2 a
STARANE +	0.336	PT/A	3 LEAF	C				
COC	1.6	PT/A	3 LEAF	C				
STARANE +	0.336	PT/A	6 LEAF	D				
COC	1.6	PT/A	6 LEAF	D				
DUAL MAGNUM	1.33	PT/A	PRE	A	1 c	2 a	37 ab	2 a
BUCTRIL +	0.6	PT/A	3 LEAF	C				
COC	1.6	PT/A	3 LEAF	C				
BUCTRIL +	0.6	PT/A	6 LEAF	D				
COC	1.6	PT/A	6 LEAF	D				
STARANE +	0.336	PT/A	3 LEAF	C	0 c	1 ab	142.3 a	4 a
BUCTRIL +	0.6	PT/A	3 LEAF	C				
POAST +	2.67	PT/A	3 LEAF	C				
COC	1.6	PT/A	3 LEAF	C				
STARANE +	0.336	PT/A	6 LEAF	D				
BUCTRIL +	0.6	PT/A	6 LEAF	D				
POAST +	2.67	PT/A	6 LEAF	D				
COC	1.6	PT/A	6 LEAF	D				
DUAL MAGNUM	1.33	PT/A	PRE	A	13 b	0 ab	0.6 b	5 a
GOAL +	0.19	PT/A	2-LEAF	B				
POAST	1.5	PT/A	2-LEAF	B				
UNTREATED CONTROL					0 c	0 b	0 b	4 a
LSD (P=.05)					4.4	1.9	138.21	4.2
CV					17.23	119.52	129.24	86.36

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

ONIONS, DRY- EVALUATION OF STARANE

Trial ID: STARANONIONC 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Celeryville, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					AMABL	A.GRASS	A.GRASS	POROL
Crop Code					ALLCE	ALLCE	ALLCE	ALLCE
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					BIOMASS	BIOMASS	BIOMASS	BIOMASS
Rating Unit					WT./GRAM	NUMBER	WT./GRAM	NUMBER
Rating Date					7/19/2002	7/19/2002	7/19/2002	7/19/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	17	18	19	20
DUAL MAGNUM	1.33	PT/A	PRE	A	22.9 b	1 a	1.2 a	8 b
STARANE +	0.336	PT/A	3 LEAF	C				
COC	1.6	PT/A	3 LEAF	C				
STARANE +	0.336	PT/A	6 LEAF	D				
COC	1.6	PT/A	6 LEAF	D				
DUAL MAGNUM	1.33	PT/A	PRE	A	22.1 b	0 a	0.7 a	13 a
BUCTRIL +	0.6	PT/A	3 LEAF	C				
COC	1.6	PT/A	3 LEAF	C				
BUCTRIL +	0.6	PT/A	6 LEAF	D				
COC	1.6	PT/A	6 LEAF	D				
STARANE +	0.336	PT/A	3 LEAF	C	136.7 a	1 a	2 a	10 ab
BUCTRIL +	0.6	PT/A	3 LEAF	C				
POAST +	2.67	PT/A	3 LEAF	C				
COC	1.6	PT/A	3 LEAF	C				
STARANE +	0.336	PT/A	6 LEAF	D				
BUCTRIL +	0.6	PT/A	6 LEAF	D				
POAST +	2.67	PT/A	6 LEAF	D				
COC	1.6	PT/A	6 LEAF	D				
DUAL MAGNUM	1.33	PT/A	PRE	A	60.1 ab	0 a	0 a	8 b
GOAL +	0.19	PT/A	2-LEAF	B				
POAST	1.5	PT/A	2-LEAF	B				
UNTREATED CONTROL					64.2 ab	0 a	0 a	9 ab
LSD (P=.05)					95.43	1.2	2.73	4.7
CV					101.21	221.31	231.38	32.02

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

ONIONS, DRY- EVALUATION OF STARANE

Trial ID: STARANONIONC 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Celeryville, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code							AMARE	AMABL
Crop Code						ALLCE	ALLCE	ALLCE
Part Rated						PLANT	WEED	WEED
Rating Data Type						INJURY	WEED	WEED
Rating Unit						PERCENT	CONTROL	CONTROL
Rating Date						8/21/2002	8/21/2002	8/21/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl	21	22	23	24
DUAL MAGNUM	1.33	PT/A	PRE	A	b	0 a	89 a	81 a
STARANE +	0.336	PT/A	3 LEAF	C				
COC	1.6	PT/A	3 LEAF	C				
STARANE +	0.336	PT/A	6 LEAF	D				
COC	1.6	PT/A	6 LEAF	D				
DUAL MAGNUM	1.33	PT/A	PRE	A	a	0 a	8 b	13 bc
BUCTRIL +	0.6	PT/A	3 LEAF	C				
COC	1.6	PT/A	3 LEAF	C				
BUCTRIL +	0.6	PT/A	6 LEAF	D				
COC	1.6	PT/A	6 LEAF	D				
STARANE +	0.336	PT/A	3 LEAF	C	ab	0 a	10 b	10 bc
BUCTRIL +	0.6	PT/A	3 LEAF	C				
POAST +	2.67	PT/A	3 LEAF	C				
COC	1.6	PT/A	3 LEAF	C				
STARANE +	0.336	PT/A	6 LEAF	D				
BUCTRIL +	0.6	PT/A	6 LEAF	D				
POAST +	2.67	PT/A	6 LEAF	D				
COC	1.6	PT/A	6 LEAF	D				
DUAL MAGNUM	1.33	PT/A	PRE	A	ab	0 a	14 b	14 b
GOAL +	0.19	PT/A	2-LEAF	B				
POAST	1.5	PT/A	2-LEAF	B				
UNTREATED CONTROL					a	0 a	0 c	0 c
LSD (P=.05)						0	6.3	12.7
CV						0	16.99	35.12

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

ONIONS, DRY- EVALUATION OF STARANE

Trial ID: STARANONIONC 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Celeryville, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					A.GRASS	POROL
Crop Code					ALLCE	ALLCE
Part Rated					WEED	WEED
Rating Data Type					WEED	WEED
Rating Unit					CONTROL	CONTROL
Rating Date					8/21/2002	8/21/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl	25	26
DUAL MAGNUM	1.33	PT/A	PRE	A	86 b	91 a
STARANE +	0.336	PT/A	3 LEAF	C		
COC	1.6	PT/A	3 LEAF	C		
STARANE +	0.336	PT/A	6 LEAF	D		
COC	1.6	PT/A	6 LEAF	D		
DUAL MAGNUM	1.33	PT/A	PRE	A	99 a	11 c
BUCTRIL +	0.6	PT/A	3 LEAF	C		
COC	1.6	PT/A	3 LEAF	C		
BUCTRIL +	0.6	PT/A	6 LEAF	D		
COC	1.6	PT/A	6 LEAF	D		
STARANE +	0.336	PT/A	3 LEAF	C	99 a	5 c
BUCTRIL +	0.6	PT/A	3 LEAF	C		
POAST +	2.67	PT/A	3 LEAF	C		
COC	1.6	PT/A	3 LEAF	C		
STARANE +	0.336	PT/A	6 LEAF	D		
BUCTRIL +	0.6	PT/A	6 LEAF	D		
POAST +	2.67	PT/A	6 LEAF	D		
COC	1.6	PT/A	6 LEAF	D		
DUAL MAGNUM	1.33	PT/A	PRE	A	99 a	66 b
GOAL +	0.19	PT/A	2-LEAF	B		
POAST	1.5	PT/A	2-LEAF	B		
UNTREATED CONTROL					0 c	0 c
LSD (P=.05)					4.3	20.8
CV					3.67	38.9

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

TOLERANCE OF BANANA, JALAPENO, AND CHERRY PEPPERS TO DUAL MAGNUM AND COMMAND

Trial ID: BABECHPEPPR 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

COOPERATOR/LANDOWNER

Cooperator: Matt Hofelich Country: USA
Org: OARDC Veg. Crops Research Branch Phone No: 419-332-5142
Address 1: 1165 CR 43
City: Fremont
State/Prov: Ohio
Postal Code: 43420

Conducted Under GLP (Y/N): N Conducted Under GEP (Y/N): N

Objective: To evaluate phytotoxicity of herbicide treatments to three types of commercial field peppers.

Crop 1: CPSAN BANANA PEPPER Variety: PAGEANT
Planting Date: 06/18/02 Planting Method: CONVENTIONAL
Rate: 12 IN. IN ROW Depth: 2 IN
Row Spacing: 30 IN. Seed Bed: CONVENTIONAL
Soil Moisture: DRY

Crop 2: CPSAN JALAPENO PEPPER Variety: BALL PARK
Planting Date: 06/18/02 Planting Method: CONVENTIONAL
Rate: 12 IN. IN ROW Depth: 2 IN
Row Spacing: 30 IN. Seed Bed: CONVENTIONAL
Soil Moisture: DRY

Crop 3: CPSAN CHERRY PEPPER Variety: CHERRY PICK
Planting Date: 06/18/02 Planting Method: CONVENTIONAL
Rate: 12 IN.in row Depth: 2 IN
Row Spacing: 30 IN. Seed Bed: CONVENTIONAL
Soil Moisture: DRY

SITE AND DESIGN

Plot Width, Unit: 15 FT Plot Length, Unit: 10 FT Reps: 3
Site Type: LEVEL FIELD
Tillage Type: CONVENTIONAL Study Design: RANDOMIZED COMPLETE BLOCK

MAINTENANCE

Field Prep./Maintenance: Log of field operations from Branch Manager:

11/18/01: Chisel plowed with JD 6310
4/19/02: worked soil with JD7210
5/5/02: Country Springs applied fertilizer with 1603 Airflow @ 350#/A (0-0-60); 150#/A.(18-46-0); and 125#/A.(46-0-0). Worked in with Danish tine.
5/23/02: Sprayed plot with 1 qt./A. Roundup Ultramax with Tappan sprayer and IH 140.
6/13/02: Worked CS west with Danish tine and 6310.
6/17/02: Staked out plot area; treatments 5, 6, 7 applied.
6/18/02: Planted 3 pepper varieties with finger planter and Ford 4610.
6/24/02: Applied treatments 2, 3, 4.
6/25/02: Cultivated peppers with AC "G".
6/27/02: Hoed, weeded, and rotovated between plots and alleys.
7/9/02: Worked alleys with Danish tine and JD 6310
7/10/02: Cultivated with AC "G".
7/18/02: Set up irrigation, irrigated with 1.5" water; broke down irrigation

7/22/02: Applied Pounce 3.2 EC @ 6oz./A.
8/2/02: Applied Quadris @ 5 oz./A and Warrior @ 3 oz./A.
8/8/02: Applied Spintor @ 2 oz./A.; Ridomil Gold/Bravo @ 2#/A.; Champ II @ 1.5 pts./A., and Pounce @ 3.2 EC @ 4 oz./A.
8/26/02: Harvested banana peppers- first time.
8/27/02: Applied Bravo WS @3 pts./A.; Spintor @ 4 oz./A.; Dimethoate @ .5 pts./A.
9/1/02: Applied Maneb 75 DF @ 1.75 #/A.; Spintor @ 4 oz./A.; Dimethoate @ .75 pts./A.
9/4/02: Harvested banana peppers 2nd time; jalapenos and cherry peppers first time.
9/6/02: Applied Quadris @ 5 oz./A; Champ II @ 1 pt./A; and Malathion @ 1.6 pts./A.
9/13/02: Applied Bravo WS @ 2.5 pts./A., Champ II @ 1 pt./A; and Asana @ 4 oz./A.
9/26/02: Applied Manex @ 1.5 qts./A.; Pounce @ 6 oz./A.; Dimethoate @ .67 pts./A.
10/9/02: Harvested and evaluated plots.
10/10/02: Subsoiled and chisel plowed trial under.

SOIL DESCRIPTION

% Sand: 70	% OM: 3	Texture:	FINE SANDY LOAM
% Silt: 20	pH: 5.8	Soil Name:	COLWOOD
% Clay: 10	CEC: 7.6	Fert. Level:	MODERATE

APPLICATION DESCRIPTION

	A	B
Applicatic	6/17/2002	6/24/2002
Time of D	6-7 PM	2-3 PM
Applicatic	SPRAY	SPRAY
Applicatic	PRE	POSTTRANS
Applic. Pl	BDCST.	BDCST.
Air Temp.	64 F	80 F
% Relativ	30	30
Wind Velc	2 MPH	3 MPH
Dew Pres	N	N
Soil Moist	DRY	MOIST
% Cloud (	50	20

CROP STAGE AT EACH APPLICATION

	A	B
Crop 1 Co	CPSAN PRE	CPSAN POSTTRANS
Stage Sc	.	VEGETATIV
Height, I	0. .	8 IN.
Crop 2 Co	CPSAN PRE	CPSAN POSTTRANS
Stage Sc	.	VEGETATIV
Height, I	0. .	8 IN.
Crop 3 Co	CPSAN PRE	CPSAN POSTTRANS
Stage Sc	.	VEGETATIV
Height, I	0. .	8 IN.

APPLICATION EQUIPMENT

	A	B
Appl. Equ	CUSTOM	CO2 BACKP
Operating	30 PSI	35 PSI
Nozzle Ty	FLAT FAN	FLAT FAN
Nozzle Si:	8002VS	8002VS
Nozzle Sp	15 IN.	12 IN.
Band Wid	10 FT.	10 FT.
Boom Hei	18 IN.	18 IN.
Ground S	3 MPH	4 MPH
Spray Vol	25 GPA	25 GPA

The Ohio State University

TOLERANCE OF BANANA, JALAPENO, AND CHERRY PEPPERS TO DUAL MAGNUM AND COMMAND

Trial ID: BABECHPEPPR 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Trial Comments

Injury ratings were based on: (0%= no injury,to 100% = severe injury). The crop was harvested repeatedly as fruit matured. Yields were taken from the entire plot,and were weighed in pounds . All pepper types tolerated treatments of Dual Magnum and Command. Crop injury was not observed. Dual Magnum was applied 6 days after transplanting, indicating that the current restriction, (see Ohio Section 24 C label for Dual Magnum) of requiring application within 48 hours of transplanting, is not a factor in crop tolerance. The Fremont research branch did experience drought conditions throughout most of the summer, which did affect plant growth.

The Ohio State University

TOLERANCE OF BANANA, JALAPENO, AND CHERRY PEPPERS TO DUAL MAGNUM AND COMMAND

Trial ID: BABECHPEPPR 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					CPSAN	CPSAN	CPSAN	CPSAN	CPSAN
Part Rated					BANANA	BANANA	BANANA	BELL	BELL
Rating Data Type					INJURY	STUNT	CHLOROSIS	INJURY	STUNT
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/24/2002	6/24/2002	6/24/2002	6/24/2002	6/24/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	1	2	3	4	5
Cultivated and Hand Hoed					0 a	0 a	0 a	0 a	0 a
Dual II Ma	0.5	PT/A	P.TRANSP	B	0 a	0 a	0 a	0 a	0 a
Dual II Ma	1	PT/A	P.TRANSP	B	0 a	0 a	0 a	0 a	0 a
Dual II Ma	2	PT/A	P.TRANSP	B	0 a	0 a	0 a	0 a	0 a
Command	1	PT/A	PREPLANT	A	0 a	0 a	0 a	0 a	0 a
Command	2	PT/A	PREPLANT	A	0 a	0 a	0 a	0 a	0 a
Command	4	PT/A	PREPLANT	A	0 a	0 a	0 a	0 a	0 a
LSD (P=.05)					0	0	0	0	0
CV					0	0	0	0	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

TOLERANCE OF BANANA, JALAPENO, AND CHERRY PEPPERS TO DUAL MAGNUM AND COMMAND

Trial ID: BABECHPEPPR 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					CPSAN	CPSAN	CPSAN	CPSAN
Part Rated					BELL	CHERRY	CHERRY	CHERRY
Rating Data Type					CHLOROSIS	INJURY	STUNT	CHLOROSIS
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/24/2002	6/24/2002	6/24/2002	6/24/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	6	7	8	9
Cultivated and Hand Hoed					0 a	0 a	0 a	0 a
Dual II Ma	0.5	PT/A	P.TRANSP	B	0 a	0 a	0 a	0 a
Dual II Ma	1	PT/A	P.TRANSP	B	0 a	0 a	0 a	0 a
Dual II Ma	2	PT/A	P.TRANSP	B	0 a	0 a	0 a	0 a
Command	1	PT/A	PREPLANT	A	0 a	0 a	0 a	0 a
Command	2	PT/A	PREPLANT	A	0 a	0 a	0 a	0 a
Command	4	PT/A	PREPLANT	A	0 a	0 a	0 a	0 a
LSD (P=.05)					0	0	0	0
CV					0	0	0	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

TOLERANCE OF BANANA, JALAPENO, AND CHERRY PEPPERS TO DUAL MAGNUM AND COMMAND

Trial ID: BABECHPEPPR 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					CPSAN	CPSAN	CPSAN	CPSAN
Part Rated					BANANA	BELL	CHERRY	BANANA
Rating Data Type					PLANT COUNT	PLANT COUNT	PLANT COUNT	UNMKTB.YLD.
Rating Unit					PER ROW	PER ROW	PER ROW	TONS/A.
Rating Date					10/8/2002	10/8/2002	10/8/2002	10/8/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	10	11	12	34
Cultivated and Hand Hoed					8 a	7 a	7 a	1.6 a
Dual II Ma	0.5	PT/A	P.TRANSP	B	6 a	6 a	5 a	1.6 a
Dual II Ma	1	PT/A	P.TRANSP	B	8 a	7 a	6 a	1.6 a
Dual II Ma	2	PT/A	P.TRANSP	B	7 a	7 a	7 a	1.2 a
Command	1	PT/A	PREPLANT	A	6 a	7 a	7 a	1.1 a
Command	2	PT/A	PREPLANT	A	8 a	7 a	7 a	1.5 a
Command	4	PT/A	PREPLANT	A	7 a	7 a	7 a	1.4 a
LSD (P=.05)					2.3	2.2	2.7	0.82
CV					17.96	18.11	22.12	32.15

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

TOLERANCE OF BANANA, JALAPENO, AND CHERRY PEPPERS TO DUAL MAGNUM AND COMMAND

Trial ID: BABECHPEPPR 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					CPSAN	CPSAN	CPSAN	CPSAN
Part Rated					BELL	BELL	CHERRY	CHERRY
Rating Data Type					MKTB.YIELD	UNMKTB.YLD.	MKTB.YIELD	UNMKTB.YLD.
Rating Unit					TONS/A.	TONS/A.	TONS/A.	TONS/A.
Rating Date					10/8/2002	10/8/2002	10/8/2002	10/8/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	35	36	37	38
Cultivated and Hand Hoed					10.5 b	1 b	4.7 a	0.7 b
Dual II Ma	0.5	PT/A	P.TRANSP	B	12.8 ab	2 ab	6.2 a	0.7 b
Dual II Ma	1	PT/A	P.TRANSP	B	11.8 b	2 ab	7.6 a	1.2 a
Dual II Ma	2	PT/A	P.TRANSP	B	12.3 b	1.9 ab	7.6 a	0.7 b
Command	1	PT/A	PREPLANT	A	17 a	2.8 a	8 a	1.1 a
Command	2	PT/A	PREPLANT	A	14.6 ab	2.2 ab	7.1 a	1.1 a
Command	4	PT/A	PREPLANT	A	13.7 ab	1.4 b	7.5 a	1.3 a
LSD (P=.05)					4.43	1.29	3.64	0.31
CV					18.8	37.9	29.34	17.94

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

POTATOES- CULTIVATION TIMING WITH WEEDCAST COMPUTER MODEL

Trial ID: POTCULTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: WOOSTER, OHIO Investigator: Dr. Douglas J. Doohan

COOPERATOR/LANDOWNER

Cooperator: Paul McMillen, Farm Mgr. Country: USA
Org: OARDC/ West Badger Farm Phone No: 330-264-7008
Address 1: Wooster,Ohio,44691
City: Wooster
State/Prov: Ohio
Postal Code: 44691

Conducted Under GLP (Y/N): N Conducted Under GEP (Y/N): N

Objective: To determine relative effectiveness of cultivation,(with or without herbicide,) at 0, 15, 30, and 60 percent emergence, for control of Pennsylvania smartweed, and to evaluate prediction accuracy of "WEEDCAST" for this species in Ohio.

CROP AND WEED DESCRIPTION

Weed	Code	Common Name	Scientific Name
1	CHEAL	common lambsquarter	Chenopodium album L.
2	CIRAR	Canada thistle	Cirsium arvense (L.)Scop.
3	AMBEL	common ragweed	Ambrosia artemisifolia L.
4	AMBTR	giant ragweed	Ambrosia trifida L.
5	THLAR	field pennycress	Thlaspi arvense L.
6	AGRASS	foxtail and crabgrass species	Setaria spp., Digitaria spp.
7	POLPY	Pennsylvania smartweed	Polygonum pensylvanicum L.
8	CYPES	yellow nutsedge	Cyperus esculentus L.
9	OXAST	yellow woodsorrel	Oxalis stricta L.
10	TAROF	common dandelion	Taraxacum officinale (Weber in Wiggers)
11	CAPBP	shepherd's-purse	Capsella bursa-pastoris (L.) Medicus

Crop 1: SOLTU POTATO Variety: SNOWDEN
Planting Date: 05/01/02 Planting Method: CONVENTIONAL
Rate: 15 CWT./A. Depth: 3 "
Row Spacing: 3 ft Seed Bed: CONVENTIONAL
Soil Temperature: 45 F Soil Moisture: MODERATE Emergence Date: 06/01/02

SITE AND DESIGN

Plot Width, Unit: 10 FT Plot Length, Unit: 20 FT Reps: 4
Site Type: LEVEL FIELD
Tillage Type: CONVENTIONAL Study Design: SPLIT-PLOT

MAINTENANCE

Field Prep./Maintenance: Plowed 4/25; broadcasted 600# 10-20-20/A. fertilizer, and disked in prior to planting. Planted "Snowden" potatoes on 5/1. Applied 600# 10-20-20/A.at planting, along with "Admire" insecticide in furrow @ 1oz./1000' of row. Potatoes were harvested commercially on 9/20.

SOIL DESCRIPTION

% Sand: 11 % OM: 3 Texture: SILT LOAM
% Silt: 75 pH: 6.0 Soil Name: WOOSTER SILT LOAM
% Clay: 14 CEC: 13 Fert. Level: MODERATE

APPLICATION DESCRIPTION

	A
Application Date:	5/6/2002
Time of Day:	10-11 AM
Application Method:	SPRAY
Application Timing:	PRE
Applic. Placement:	BDCST.
Air Temp., Unit:	49 F
% Relative Humidity:	79
Wind Velocity, Unit:	3 MPH
% Cloud Cover:	70

CROP STAGE AT EACH APPLICATION

	A
Crop 1 Code, Stage:	SOLTU PRE
Stage Scale:	.
Height, Unit:	0. .

WEED STAGE AT EACH APPLICATION

	A
Weed 1 Code, Stage:	CHEAL PRE
Stage Scale:	.
Density, Unit:	. .
Weed 2 Code, Stage:	CIRAR PRE
Stage Scale:	.
Density, Unit:	. .
Weed 3 Code, Stage:	AMBEL PRE
Stage Scale:	.
Density, Unit:	. .
Weed 4 Code, Stage:	AMBTR PRE
Stage Scale:	.
Density, Unit:	. .
Weed 5 Code, Stage:	THLAR PRE
Stage Scale:	.
Density, Unit:	. .
Weed 6 Code, Stage:	AGRAS PRE
Stage Scale:	.
Density, Unit:	. .
Weed 7 Code, Stage:	POLPY PRE
Stage Scale:	.
Density, Unit:	. .
Weed 8 Code, Stage:	CYPES PRE
Stage Scale:	.
Density, Unit:	. .
Weed 9 Code, Stage:	OXAST PRE
Stage Scale:	.
Density, Unit:	. .
Weed10 Code, Stage:	TAROF PRE
Stage Scale:	.
Density, Unit:	. .
Weed11 Code, Stage:	CAPBP PRE
Stage Scale:	.
Density, Unit:	. .

APPLICATION EQUIPMENT

	A
Appl. Equipment:	CO2 PLOT
Operating Pressure:	35 PSI
Nozzle Type:	FLAT FAN
Nozzle Size:	8002 VS
Nozzle Spacing, Unit:	12 IN.
Nozzles/Row:	10
Band Width, Unit:	10 FT.
Boom Height, Unit:	18 IN.
Ground Speed, Unit:	4 MPH

The Ohio State University

POTATOES- CULTIVATION TIMING WITH WEEDCAST COMPUTER MODEL

Trial ID: POTCULTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: WOOSTER, OHIO Investigator: Dr. Douglas J. Doohan

Trial Comments

Weeds were not emerged when PRE herbicide treatment was applied. The " WEEDCAST" model was used to predict smartweed germination. Plots were cultivated at 15, 30, and 60 percent germination. Potatoes were hilled on June 26.

EMERGENCE	15%	30%	60%
CULTIV.#1	MAY 16	MAY 21	MAY 28
CULTIV#2	MAY 28	JUNE 5	JUNE 10
CULTIV#3	JUNE 19		

Weed ratings range from(0% = no control to 100 % = complete control). Weed counts are the sum of three (50 X 50 cm.) quadrats per plot. We experienced a severe drought this summer which impacted plant growth and yield. Yields were taken from the two center rows 20' in length.

The marketable grade potatoes were seperated by size, (diameter), into an "A" or "B" class:
"A"= USDA STD. #1 ; 1 7/8 " or >
"B"= 1.78 " or <
"CULL"= misshapen, diseased, or otherwise unmarketable.

The Ohio State University

POTATOES- CULTIVATION TIMING WITH WEEDCAST COMPUTER MODEL

Trial ID: POTCULTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: WOOSTER, OHIO Investigator: Dr. Douglas J. Doohan

Weed Code					CHEAL	AMBEL	AMBTR	AGRASS	POLPY
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED	WEED
Rating Data Type					COUNTS	COUNTS	COUNTS	COUNTS	COUNTS
Rating Unit					PER PLOT	PER PLOT	PER PLOT	PER PLOT	PER PLOT
Rating Date					5/15/2002	5/15/2002	5/15/2002	5/15/2002	5/15/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	1	2	3	4	5
ZERO EMERGENCE CULTIVATION ONLY					2 ab	1 a	0 a	1 a	13 a
ZERO EMERGENCE					0 b	0 a	0 a	0 b	6 a
CULTIVAT.	1.57	PT/A	PRE	A					
SENCOR	0.595	LB/A	PRE	A					
15% EMERGENCE CULTIVATION ONLY					2 ab	1 a	0 a	1 ab	17 a
15% EMERGENCE					1 ab	0 a	0 a	0 b	6 a
CULTIVAT.	1.57	PT/A	PRE	A					
SENCOR	0.595	LB/A	PRE	A					
30% EMERGENCE CULTIVATION ONLY					3 ab	1 a	0 a	0 b	9 a
30% EMERGENCE					0 ab	0 a	0 a	0 b	4 a
CULTIVAT.	1.57	PT/A	PRE	A					
SENCOR	0.595	LB/A	PRE	A					
60% EMERGENCE CULTIVATION ONLY					4 a	0 a	0 a	0 b	8 a
60% EMERGENCE					1 ab	0 a	0 a	0 b	10 a
CULTIVAT.	1.57	PT/A	PRE	A					
SENCOR	0.595	LB/A	PRE	A					
LSD (P=.05)					3.4	1.2	0.1	0.9	14.6
CV					145.73	157.7	565.69	193.87	110.94

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

POTATOES- CULTIVATION TIMING WITH WEEDCAST COMPUTER MODEL

Trial ID: POTCULTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: WOOSTER, OHIO Investigator: Dr. Douglas J. Doohan

Weed Code					CYPES	CHEAL	AMBEL	AMBTR	AGRASS
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED	WEED
Rating Data Type					COUNTS	COUNTS	COUNTS	COUNTS	COUNTS
Rating Unit					PER PLOT	PER PLOT	PER PLOT	PER PLOT	PER PLOT
Rating Date					5/15/2002	5/22/2002	5/22/2002	5/22/2002	5/22/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	6	7	8	9	10
ZERO EMERGENCE CULTIVATION ONLY					0 ab	4 a	2 a	0 a	1 ab
ZERO EMERGENCE					0 bc	1 b	0 c	0 a	0 ab
CULTIVAT.	1.57	PT/A	PRE	A					
SENCOR	0.595	LB/A	PRE	A					
15% EMERGENCE CULTIVATION ONLY					1 a	0 b	0 c	0 a	0 b
15% EMERGENCE					0 c	0 b	0 c	0 a	0 b
CULTIVAT.	1.57	PT/A	PRE	A					
SENCOR	0.595	LB/A	PRE	A					
30% EMERGENCE CULTIVATION ONLY					0 bc	2 ab	1 ab	0 a	2 a
30% EMERGENCE					0 abc	0 b	0 bc	1 a	0 b
CULTIVAT.	1.57	PT/A	PRE	A					
SENCOR	0.595	LB/A	PRE	A					
60% EMERGENCE CULTIVATION ONLY					0 bc	3 ab	1 abc	0 a	0 ab
60% EMERGENCE					0 c	1 b	0 c	0 a	0 b
CULTIVAT.	1.57	PT/A	PRE	A					
SENCOR	0.595	LB/A	PRE	A					
LSD (P=.05)					0.4	2.7	1	1	1.5
CV					158.87	134.92	146.11	417.48	214.62

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

POTATOES- CULTIVATION TIMING WITH WEEDCAST COMPUTER MODEL

Trial ID: POTCULTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: WOOSTER, OHIO Investigator: Dr. Douglas J. Doohan

Weed Code					POLPY	CYPES	CHEAL	AMBEL	AMBTR
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED	WEED
Rating Data Type					COUNTS	COUNTS	COUNTS	COUNTS	COUNTS
Rating Unit					PER PLOT	PER PLOT	PER PLOT	PER PLOT	PER PLOT
Rating Date					5/22/2002	5/22/2002	5/29/2002	5/29/2002	5/29/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	11	12	13	14	15
ZERO EMERGENCE CULTIVATION ONLY					15 a	0 ab	7 a	2 a	0 b
ZERO EMERGENCE					0 b	0 ab	0 b	0 b	0 b
CULTIVAT.	1.57	PT/A	PRE	A					
SENCOR	0.595	LB/A	PRE	A					
15% EMERGENCE CULTIVATION ONLY					0 b	0 b	1 b	0 b	0 b
15% EMERGENCE					0 b	0 ab	0 b	0 b	0 b
CULTIVAT.	1.57	PT/A	PRE	A					
SENCOR	0.595	LB/A	PRE	A					
30% EMERGENCE CULTIVATION ONLY					13 a	1 ab	0 b	0 b	0 b
30% EMERGENCE					1 b	0 ab	0 b	0 b	0 b
CULTIVAT.	1.57	PT/A	PRE	A					
SENCOR	0.595	LB/A	PRE	A					
60% EMERGENCE CULTIVATION ONLY					11 a	1 a	2 b	1 a	1 a
60% EMERGENCE					1 b	0 b	0 b	0 b	0 b
CULTIVAT.	1.57	PT/A	PRE	A					
SENCOR	0.595	LB/A	PRE	A					
LSD (P=.05)					7.4	0.8	2.1	0.8	0.7
CV					96.81	175.91	106.77	107.84	261.11

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

POTATOES- CULTIVATION TIMING WITH WEEDCAST COMPUTER MODEL

Trial ID: POTCULTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: WOOSTER, OHIO Investigator: Dr. Douglas J. Doohan

Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	AGRASS SOLTU WEED COUNTS PER PLOT 5/29/2002 16	POLPY SOLTU WEED COUNTS PER PLOT 5/29/2002 17	CYPES SOLTU WEED COUNTS PER PLOT 5/29/2002 18	CHEAL SOLTU WEED COUNTS PER PLOT 6/5/2002 19	AMBEL SOLTU WEED COUNTS PER PLOT 6/5/2002 20
ZERO EMERGENCE CULTIVATION ONLY					1 a	15 a	0 a	6 a	2 a
ZERO EMERGENCE					0 b	0 c	0 a	0 b	0 b
CULTIVAT.	1.57	PT/A	PRE	A					
SENCOR	0.595	LB/A	PRE	A					
15% EMERGENCE CULTIVATION ONLY					0 b	4 bc	0 a	1 b	0 b
15% EMERGENCE					0 b	0 c	0 a	0 b	0 b
CULTIVAT.	1.57	PT/A	PRE	A					
SENCOR	0.595	LB/A	PRE	A					
30% EMERGENCE CULTIVATION ONLY					0 b	0 c	0 a	2 b	1 b
30% EMERGENCE					0 b	0 c	0 a	2 b	0 b
CULTIVAT.	1.57	PT/A	PRE	A					
SENCOR	0.595	LB/A	PRE	A					
60% EMERGENCE CULTIVATION ONLY					0 b	10 ab	1 a	0 b	0 b
60% EMERGENCE					0 b	1 c	0 a	0 b	0 b
CULTIVAT.	1.57	PT/A	PRE	A					
SENCOR	0.595	LB/A	PRE	A					
LSD (P=.05)					0.8	6.6	0.7	3.5	0.6
CV					206.03	115.63	300	156.25	117.31

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

POTATOES- CULTIVATION TIMING WITH WEEDCAST COMPUTER MODEL

Trial ID: POTCULTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: WOOSTER, OHIO Investigator: Dr. Douglas J. Doohan

Weed Code					AMBTR	AGRASS	POLPY	CYPES	CHEAL
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED	WEED
Rating Data Type					COUNTS	COUNTS	COUNTS	COUNTS	COUNTS
Rating Unit					PER PLOT	PER PLOT	PER PLOT	PER PLOT	PER PLOT
Rating Date					6/5/2002	6/5/2002	6/5/2002	6/5/2002	6/12/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	21	22	23	24	25
ZERO EMERGENCE CULTIVATION ONLY					0 ab	2 a	14 a	2 a	4 a
ZERO EMERGENCE					0 b	0 b	0 c	0 c	0 b
CULTIVAT.	1.57	PT/A	PRE	A					
SENCOR	0.595	LB/A	PRE	A					
15% EMERGENCE CULTIVATION ONLY					0 a	0 b	3 bc	1 a	1 b
15% EMERGENCE					0 b	0 b	0 c	0 bc	0 b
CULTIVAT.	1.57	PT/A	PRE	A					
SENCOR	0.595	LB/A	PRE	A					
30% EMERGENCE CULTIVATION ONLY					0 b	1 ab	7 b	1 ab	1 b
30% EMERGENCE					0 b	0 b	0 c	0 c	0 b
CULTIVAT.	1.57	PT/A	PRE	A					
SENCOR	0.595	LB/A	PRE	A					
60% EMERGENCE CULTIVATION ONLY					0 b	1 b	2 bc	1 a	0 b
60% EMERGENCE					0 ab	0 b	0 bc	0 bc	0 b
CULTIVAT.	1.57	PT/A	PRE	A					
SENCOR	0.595	LB/A	PRE	A					
LSD (P=.05)					0.1	1.2	6.4	1	2.1
CV					230.94	164.75	134.21	101.18	195.01

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

POTATOES- CULTIVATION TIMING WITH WEEDCAST COMPUTER MODEL

Trial ID: POTCULTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: WOOSTER, OHIO Investigator: Dr. Douglas J. Doohan

Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	26	27	28	29
Weed Code					AMBEL	AMBTR	AGRASS	POLPY
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					COUNTS	COUNTS	COUNTS	COUNTS
Rating Unit					PER PLOT	PER PLOT	PER PLOT	PER PLOT
Rating Date					6/12/2002	6/12/2002	6/12/2002	6/12/2002
ZERO EMERGENCE CULTIVATION ONLY					0 a	1 a	4 a	8 a
ZERO EMERGENCE					0 a	0 b	0 b	0 d
CULTIVAT.	1.57	PT/A	PRE	A				
SENCOR	0.595	LB/A	PRE	A				
15% EMERGENCE CULTIVATION ONLY					0 a	0 b	1 b	7 ab
15% EMERGENCE					0 a	0 b	0 b	2 bcd
CULTIVAT.	1.57	PT/A	PRE	A				
SENCOR	0.595	LB/A	PRE	A				
30% EMERGENCE CULTIVATION ONLY					0 a	0 b	1 b	6 abc
30% EMERGENCE					0 a	0 b	0 b	1 cd
CULTIVAT.	1.57	PT/A	PRE	A				
SENCOR	0.595	LB/A	PRE	A				
60% EMERGENCE CULTIVATION ONLY					0 a	0 b	0 b	0 d
60% EMERGENCE					0 a	0 b	0 b	0 d
CULTIVAT.	1.57	PT/A	PRE	A				
SENCOR	0.595	LB/A	PRE	A				
LSD (P=.05)					0.5	0.3	2.6	5.5
CV					299.33	119.09	226.47	127.35

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

POTATOES- CULTIVATION TIMING WITH WEEDCAST COMPUTER MODEL

Trial ID: POTCULTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: WOOSTER, OHIO Investigator: Dr. Douglas J. Doohan

Weed Code					CYPES	CHEAL	AMBEL	AMBTR
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					COUNTS	COUNTS	COUNTS	COUNTS
Rating Unit					PER PLOT	PER PLOT	PER PLOT	PER PLOT
Rating Date					6/12/2002	6/18/2002	6/18/2002	6/18/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	30	31	32	33
ZERO EMERGENCE CULTIVATION ONLY					1 b	8 a	1 a	0 a
ZERO EMERGENCE					0 b	0 b	0 b	0 a
CULTIVAT.	1.57	PT/A	PRE	A				
SENCOR	0.595	LB/A	PRE	A				
15% EMERGENCE CULTIVATION ONLY					7 a	8 a	1 ab	1 a
15% EMERGENCE					0 b	3 ab	0 b	0 a
CULTIVAT.	1.57	PT/A	PRE	A				
SENCOR	0.595	LB/A	PRE	A				
30% EMERGENCE CULTIVATION ONLY					0 b	2 ab	0 b	0 a
30% EMERGENCE					0 b	1 ab	0 b	0 a
CULTIVAT.	1.57	PT/A	PRE	A				
SENCOR	0.595	LB/A	PRE	A				
60% EMERGENCE CULTIVATION ONLY					0 b	0 b	0 b	0 a
60% EMERGENCE					0 b	0 ab	0 b	0 a
CULTIVAT.	1.57	PT/A	PRE	A				
SENCOR	0.595	LB/A	PRE	A				
LSD (P=.05)					3.7	7.3	0.7	0.7
CV					223.64	193.08	202.63	208.74

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

POTATOES- CULTIVATION TIMING WITH WEEDCAST COMPUTER MODEL

Trial ID: POTCULTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: WOOSTER, OHIO Investigator: Dr. Douglas J. Doohan

Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	34	35	36	37
Weed Code					AGRASS	POLPY	CYPES	CHEAL
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					COUNTS	COUNTS	COUNTS	CONTROL
Rating Unit					PER PLOT	PER PLOT	PER PLOT	PERCENT
Rating Date					6/18/2002	6/18/2002	6/18/2002	6/25/2002
ZERO EMERGENCE CULTIVATION ONLY					1 a	18 a	0 b	0 e
ZERO EMERGENCE					0 c	0 b	0 b	97 ab
CULTIVAT.	1.57	PT/A	PRE	A				
SENCOR	0.595	LB/A	PRE	A				
15% EMERGENCE CULTIVATION ONLY					1 abc	6 b	9 a	64 c
15% EMERGENCE					1 abc	0 b	0 b	96 ab
CULTIVAT.	1.57	PT/A	PRE	A				
SENCOR	0.595	LB/A	PRE	A				
30% EMERGENCE CULTIVATION ONLY					1 ab	3 b	2 b	34 d
30% EMERGENCE					0 bc	2 b	0 b	79 bc
CULTIVAT.	1.57	PT/A	PRE	A				
SENCOR	0.595	LB/A	PRE	A				
60% EMERGENCE CULTIVATION ONLY					0 abc	0 b	2 b	40 d
60% EMERGENCE					0 abc	1 b	2 b	99 a
CULTIVAT.	1.57	PT/A	PRE	A				
SENCOR	0.595	LB/A	PRE	A				
LSD (P=.05)					1.2	9.3	4	18.6
CV					138.78	172.7	139.64	19.92

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

POTATOES- CULTIVATION TIMING WITH WEEDCAST COMPUTER MODEL

Trial ID: POTCULTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: WOOSTER, OHIO Investigator: Dr. Douglas J. Doohan

Weed Code					AMBEL	AMBTR	AGRASS	POLPY
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					CONTROL	CONTROL	CONTROL	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/25/2002	6/25/2002	6/25/2002	6/25/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	38	39	40	41
ZERO EMERGENCE CULTIVATION ONLY					0 d	0 c	0 c	0 d
ZERO EMERGENCE					95 ab	95 a	96 a	97 a
CULTIVAT.	1.57	PT/A	PRE	A				
SENCOR	0.595	LB/A	PRE	A				
15% EMERGENCE CULTIVATION ONLY					67 bc	54 b	87 a	55 bc
15% EMERGENCE					96 ab	85 ab	97 a	90 a
CULTIVAT.	1.57	PT/A	PRE	A				
SENCOR	0.595	LB/A	PRE	A				
30% EMERGENCE CULTIVATION ONLY					58 c	60 b	56 b	40 c
30% EMERGENCE					69 bc	82 ab	70 ab	74 ab
CULTIVAT.	1.57	PT/A	PRE	A				
SENCOR	0.595	LB/A	PRE	A				
60% EMERGENCE CULTIVATION ONLY					41 c	54 b	75 ab	40 c
60% EMERGENCE					99 a	80 ab	99 a	99 a
CULTIVAT.	1.57	PT/A	PRE	A				
SENCOR	0.595	LB/A	PRE	A				
LSD (P=.05)					28.4	31.2	29.9	27.7
CV					29.51	33.47	28.17	30.52

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

POTATOES- CULTIVATION TIMING WITH WEEDCAST COMPUTER MODEL

Trial ID: POTCULTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: WOOSTER, OHIO Investigator: Dr. Douglas J. Doohan

Weed Code					CYPES	CHEAL	AMBEL	AMBTR
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					CONTROL	COUNTS	COUNTS	COUNTS
Rating Unit					PERCENT	PER PLOT	PER PLOT	PER PLOT
Rating Date					6/25/2002	7/10/2002	7/10/2002	7/10/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	42	43	44	45
ZERO EMERGENCE CULTIVATION ONLY					0 d	44 a	9 a	4 a
ZERO EMERGENCE					81 ab	1 c	0 b	1 a
CULTIVAT.	1.57	PT/A	PRE	A				
SENCOR	0.595	LB/A	PRE	A				
15% EMERGENCE CULTIVATION ONLY					51 bc	14 bc	3 ab	2 a
15% EMERGENCE					94 a	1 c	1 b	2 a
CULTIVAT.	1.57	PT/A	PRE	A				
SENCOR	0.595	LB/A	PRE	A				
30% EMERGENCE CULTIVATION ONLY					37 c	4 c	1 b	1 a
30% EMERGENCE					78 ab	1 c	0 b	1 a
CULTIVAT.	1.57	PT/A	PRE	A				
SENCOR	0.595	LB/A	PRE	A				
60% EMERGENCE CULTIVATION ONLY					19 cd	26 b	6 a	2 a
60% EMERGENCE					96 a	0 c	0 b	1 a
CULTIVAT.	1.57	PT/A	PRE	A				
SENCOR	0.595	LB/A	PRE	A				
LSD (P=.05)					36.6	18.5	5.3	3.4
CV					43.68	112.02	149.94	146.85

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

POTATOES- CULTIVATION TIMING WITH WEEDCAST COMPUTER MODEL

Trial ID: POTCULTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: WOOSTER, OHIO Investigator: Dr. Douglas J. Doohan

Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	Weed Code	Crop Code	Part Rated	Rating Data Type	Rating Unit	Rating Date	46	47	48	49
					AGRASS	SOLTU	WEED	COUNTS	PER PLOT	7/10/2002				
					POLPY	SOLTU	WEED	COUNTS	PER PLOT	7/10/2002				
					CIRAR	SOLTU	WEED	COUNTS	PER PLOT	7/10/2002				
					OXAST	SOLTU	WEED	COUNTS	PER PLOT	7/10/2002				
ZERO EMERGENCE CULTIVATION ONLY											3 a	91 a	0 a	4 a
ZERO EMERGENCE											2 a	0 b	0 a	0 b
CULTIVAT.	1.57	PT/A	PRE	A										
SENCOR	0.595	LB/A	PRE	A										
15% EMERGENCE CULTIVATION ONLY											2 a	22 b	0 a	0 b
15% EMERGENCE											0 a	1 b	0 a	0 b
CULTIVAT.	1.57	PT/A	PRE	A										
SENCOR	0.595	LB/A	PRE	A										
30% EMERGENCE CULTIVATION ONLY											2 a	9 b	0 a	0 b
30% EMERGENCE											0 a	1 b	3 a	0 b
CULTIVAT.	1.57	PT/A	PRE	A										
SENCOR	0.595	LB/A	PRE	A										
60% EMERGENCE CULTIVATION ONLY											1 a	78 a	0 a	1 b
60% EMERGENCE											0 a	3 b	0 a	0 b
CULTIVAT.	1.57	PT/A	PRE	A										
SENCOR	0.595	LB/A	PRE	A										
LSD (P=.05)											4.1	37.5	3.1	2.8
CV											251.79	99.45	565.69	301.61

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

POTATOES- CULTIVATION TIMING WITH WEEDCAST COMPUTER MODEL

Trial ID: POTCULTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: WOOSTER, OHIO Investigator: Dr. Douglas J. Doohan

Weed Code					THLAR	CYPES	CAPBP	TAROF
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					COUNTS	COUNTS	COUNTS	COUNTS
Rating Unit					PER PLOT	PER PLOT	PER PLOT	PER PLOT
Rating Date					7/10/2002	7/10/2002	7/10/2002	7/10/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	50	51	52	53
ZERO EMERGENCE CULTIVATION ONLY					0 a	0 b	0 b	0 b
ZERO EMERGENCE					0 a	1 a	0 b	0 b
CULTIVAT.	1.57	PT/A	PRE	A				
SENCOR	0.595	LB/A	PRE	A				
15% EMERGENCE CULTIVATION ONLY					0 a	1 ab	0 b	0 a
15% EMERGENCE					0 a	1 ab	0 b	0 b
CULTIVAT.	1.57	PT/A	PRE	A				
SENCOR	0.595	LB/A	PRE	A				
30% EMERGENCE CULTIVATION ONLY					0 a	0 b	0 b	0 b
30% EMERGENCE					0 a	0 b	0 b	0 b
CULTIVAT.	1.57	PT/A	PRE	A				
SENCOR	0.595	LB/A	PRE	A				
60% EMERGENCE CULTIVATION ONLY					0 a	0 b	1 a	0 ab
60% EMERGENCE					0 a	0 b	0 b	0 b
CULTIVAT.	1.57	PT/A	PRE	A				
SENCOR	0.595	LB/A	PRE	A				
LSD (P=.05)					0.1	0.9	0.4	0.2
CV					565.69	213.22	324.73	299.56

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

POTATOES- CULTIVATION TIMING WITH WEEDCAST COMPUTER MODEL

Trial ID: POTCULTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: WOOSTER, OHIO Investigator: Dr. Douglas J. Doohan

Weed Code							
Crop Code					SOLTU	SOLTU	SOLTU
Part Rated					TUBER	TUBER	TUBER
Rating Data Type					YIELD"A"	YIELD"B"	CULLS
Rating Unit					CWT./A.	CWT./A.	CWT./A.
Rating Date					9/20/2002	9/20/2002	9/20/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	57	58	59
ZERO EMERGENCE CULTIVATION ONLY					14.5 c	8.4 d	1.2 d
ZERO EMERGENCE					131.3 ab	19.6 bc	17.8 a
CULTIVAT.	1.57	PT/A	PRE	A			
SENCOR	0.595	LB/A	PRE	A			
15% EMERGENCE CULTIVATION ONLY					122.1 ab	28.2 a	4.3 bcd
15% EMERGENCE					153.7 a	22.3 abc	5.9 bcd
CULTIVAT.	1.57	PT/A	PRE	A			
SENCOR	0.595	LB/A	PRE	A			
30% EMERGENCE CULTIVATION ONLY					116.8 ab	25.8 ab	5.1 bcd
30% EMERGENCE					146.3 a	23.6 abc	8.9 b
CULTIVAT.	1.57	PT/A	PRE	A			
SENCOR	0.595	LB/A	PRE	A			
60% EMERGENCE CULTIVATION ONLY					61.9 bc	18.3 c	2.8 cd
60% EMERGENCE					171.1 a	23.7 abc	7.4 bc
CULTIVAT.	1.57	PT/A	PRE	A			
SENCOR	0.595	LB/A	PRE	A			
LSD (P=.05)					74.25	6.88	5.08
CV					44.01	22.01	51.75

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

HERBICIDE PROGRAMS FOR POTATOES

Trial ID: MATRIXPOT 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

COOPERATOR/LANDOWNER

Cooperator: Paul McMillen,Farm Mgr.
Org: O.A.R.D.C. Phone No: 330-264-7008
Address 1: East Badger Farm
Address 2: Ely Road
City: Wooster
State/Prov: Ohio
Postal Code: 44691

Conducted Under GLP (Y/N): N Conducted Under GEP (Y/N): N

Objective: To evaluate various rates and timings of new and conventional herbicides for potato weed control.

CROP AND WEED DESCRIPTION

Weed	Code	Common Name	Scientific Name
1	CHEAL	common lambsquarter	Chenopodium album L.
2	AGRASS	foxtail and crabgrass spec	Setaria spp., Digitaria spp.
3	AMBEL	common ragweed	Ambrosia artemesifolia L.
4	POLPY	Pennsylvania smartweed	Polygonum pensylvanicum L.
5	AMBTR	giant ragweed	Ambrosia trifida
6	CYPES	yellow nutsedge	Cyperus esclentes L.
7	CIRAR	Canada thistle	Cirsium arvense (L) SCOP.
8	TAROF	common dandelion	Taxacum officinale (Weber in Wiggers)

Crop 1: SOLTU POTATO Variety: RED NORLAND
Planting Date: 05/01/02 Planting Method: CONVENTIONAL
Rate: 15 CWT./A. Depth: 3 IN
Row Spacing: 36 IN. Seed Bed: CONVENTIONAL
Soil Moisture: MEDIUM Emergence Date: 06/01/02

SITE AND DESIGN

Plot Width, Unit: 10 FT Plot Length, Unit: 20 FT Reps: 4
Site Type: LEVEL FIELD
Tillage Type: CONVENTIONAL Study Design: RANDOMIZED COMPLETE BLOCK

MAINTENANCE

Field Prep./Maintenance: Plowed 4/25; broadcasted 600# 10-20-20/A. fertilizer, and disked in prior to planting. Planted "Red Norland" certified "B" seed potatoes on 5/1. Applied 600# 10-20-20/A.at planting, along with "Admire" insecticide in furrow @ 1oz./1000' of row. Potatoes were harvested commercially on 9/20.

SOIL DESCRIPTION

% Sand: 11 % OM: 3 Texture: SILT LOAM
% Silt: 75 pH: 6.0 Soil Name: WOOSTER SILT LOAM
% Clay: 14 CEC: 13 Fert. Level: MODERATE

APPLICATION DESCRIPTION

	A	B	C
Application Date:	5/6/2002	6/10/2002	6/24/2002
Time of Day:	1-2 PM	10-11 AM	11-12AM
Application Method:	SPRAY	SPRAY	SPRAY
Application Timing:	PRE	POST	LATE POST
Applic. Placement:	BDCST.	BDCST.	BDCST.
Air Temp., Unit:	59 F	73 F	78 F
% Relative Humidity:	79	77	72
Wind Velocity, Unit:	2.0 MPH	1.5 MPH	2.0 MPH
% Cloud Cover:	50	75	25

CROP STAGE AT EACH APPLICATION

	A	B	C
Crop 1 Code, Stage:	SOLTU PRE	SOLTU POST	SOLTU LATE POST
Stage Scale:	.	VEGETAT.	VEGETAT.
Height, Unit:	0. .	12 INCH	24 INCH

WEED STAGE AT EACH APPLICATION

	A	B	C
Weed 1 Code, Stage:	CHEAL PRE	CHEAL POST	CHEAL LATE POST
Stage Scale:	.	4-8" tall	.
Density, Unit:	. .	. .	. .
Weed 2 Code, Stage:	AGRAS PRE	AGRAS POST	AGRAS LATE POST
Stage Scale:	.	2-4 leaf	2-8" HI
Density, Unit:	. .	. .	. .
Weed 3 Code, Stage:	AMBEL PRE	AMBEL POST	AMBEL LATE POST
Stage Scale:	.	4-8" tall	9-20" HI
Density, Unit:	. .	. .	L-M .
Weed 4 Code, Stage:	POLPY PRE	POLPY POST	POLPY LATE POST
Stage Scale:	.	4-8" tall	.
Density, Unit:	. .	. .	. .
Weed 5 Code, Stage:	AMBTR PRE	AMBTR POST	AMBTR LATE POST
Stage Scale:	.	6-10"tall	12-24" HI
Density, Unit:	. .	. .	L-M .
Weed 6 Code, Stage:	CYPES PRE	CYPES POST	CYPES LATE POST
Stage Scale:	.	2-6 leaf	1-6" HI
Density, Unit:	. .	. .	L-M .
Weed 7 Code, Stage:	CIRAR PRE	CIRAR POST	CIRAR LATE POST
Stage Scale:	.	8-12"tall	.
Density, Unit:	. .	. .	. .
Weed 8 Code, Stage:	TAROF PRE	TAROF POST	TAROF LATE POST
Stage Scale:	.	.	.
Density, Unit:	. .	. .	. .

APPLICATION EQUIPMENT

	A	B	C
Appl. Equipment:	CO2 PLOT	CO2 PLOT	CO2 PLOT
Operating Pressure:	35 PSI	35 PSI	35 PSI
Nozzle Type:	FLAT FAN	FLAT FAN	FLAT FAN
Nozzle Size:	8002 VS	8002 VS	8002 VS
Nozzle Spacing, Unit:	12 INCH	12 INCH	12 INCH
Nozzles/Row:	10	10	10
Band Width, Unit:	10 FEET	10 FEET	10 FEET
Boom Height, Unit:	18 INCH	18 INCH	18 INCH
Ground Speed, Unit:	4 MPH	4 MPH	4 MPH

The Ohio State University

HERBICIDE PROGRAMS FOR POTATOES

Trial ID: MATRIXPOT 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Trial Comments

Weed ratings range from(0% = no control to 100 % = complete control). Weed counts are the sum of three (50 X 50 cm.) quadrats per plot. We experienced a severe drought this summer which impacted plant growth and yield. Yields were taken from one row, 20' in length.

The marketable grade potatoes were seperated by size, (diameter), into an "A" or "B" class:
"A"= USDA STD. #1 ; 1 7/8 " or >
"B"= 1.78 " or <
"CULL"= misshapen, diseased, or otherwise unmarketable.

The Ohio State University

HERBICIDE PROGRAMS FOR POTATOES

Trial ID: MATRIXPOT 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code						CIRAR	CHEAL	AMBEL
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					PLANT	WEED	WEED	WEED
Rating Data Type					INJURY	CONTROL	CONTROL	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					5/13/2002	5/13/2002	5/13/2002	5/13/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	1	2	3	4
UNTREATED CONTROL					0 a	0 b	0 b	0 b
LOROX +	1.5	LB/A	PRE	A	0 a	55 a	92 a	78 a
MATRIX	1.5	OZ/A	PRE	A				
LOROX +	1.5	LB/A	PRE	A	0 a	74 a	97 a	72 a
MATRIX +	1	OZ/A	POST	B				
SENCOR +	2	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
MATRIX +	1.5	OZ/A	POST REG	C				
COC	1.6	PT/A	POST REG	C				
LOROX	1.5	LB/A	PRE	A	0 a	56 a	99 a	50 a
MATRIX +	1.5	OZ/A	POST	B				
SENCOR +	4	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
LOROX	1.5	LB/A	PRE	A	0 a	70 a	92 a	85 a
MATRIX +	1.5	OZ/A	POST	B				
SENCOR +	2	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
DUAL MAGNUM ·	1.57	PT/A	PRE	A	0 a	74 a	96 a	82 a
SENCOR	9.5	OZ/A	PRE	A				
DEFINE	16	OZ/A	PRE	A	0 a	72 a	99 a	84 a
AUTHORITY	3.2	OZ/A	PRE	A	0 a	73 a	99 a	84 a
DEFINE+	16	OZ/A	PRE	A	0 a	76 a	99 a	75 a
SENCOR	10.7	OZ/A	PRE	A				
DEFINE+	16	OZ/A	PRE	A	0 a	76 a	99 a	87 a
AUTHORITY	3.2	OZ/A	PRE	A				
SENCOR+	10.7	OZ/A	PRE	A	0 a	71 a	99 a	82 a
AUTHORITY	3.2	OZ/A	PRE	A				
SENCOR+	10.7	OZ/A	POS3"NS	B				
AUTHORITY	3.2	OZ/A	POS3"NS	B				
LSD (P=.05)					0	39	9.5	38.9
CV					0	42.65	7.43	38.1

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

HERBICIDE PROGRAMS FOR POTATOES

Trial ID: MATRIXPOT 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	5	6	7	8
Weed Code					AMBTR	POLPY	CYPES	CHEAL
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					CONTROL	CONTROL	CONTROL	COUNT
Rating Unit					PERCENT	PERCENT	PERCENT	PER PLOT
Rating Date					5/13/2002	5/13/2002	5/13/2002	5/28/2002
UNTREATED CONTROL					0 c	0 e	0 g	95 a
LOROX +	1.5	LB/A	PRE	A	83 ab	9 de	61 a-d	0 b
MATRIX	1.5	OZ/A	PRE	A				
LOROX +	1.5	LB/A	PRE	A	74 ab	18 de	44 def	8 b
MATRIX +	1	OZ/A	POST	B				
SENCOR +	2	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
MATRIX +	1.5	OZ/A	POST REG	C				
COC	1.6	PT/A	POST REG	C				
LOROX	1.5	LB/A	PRE	A	57 b	13 de	24 fg	0 b
MATRIX +	1.5	OZ/A	POST	B				
SENCOR +	4	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
LOROX	1.5	LB/A	PRE	A	92 a	35 cd	33 ef	1 b
MATRIX +	1.5	OZ/A	POST	B				
SENCOR +	2	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
DUAL MAGNUM +	1.57	PT/A	PRE	A	92 a	51 bc	74 abc	0 b
SENCOR	9.5	OZ/A	PRE	A				
DEFINE	16	OZ/A	PRE	A	76 ab	51 bc	51 b-e	1 b
AUTHORITY	3.2	OZ/A	PRE	A	80 ab	69 ab	70 a-d	0 b
DEFINE+	16	OZ/A	PRE	A	84 ab	72 ab	48 c-f	0 b
SENCOR	10.7	OZ/A	PRE	A				
DEFINE+	16	OZ/A	PRE	A	84 ab	92 a	80 a	0 b
AUTHORITY	3.2	OZ/A	PRE	A				
SENCOR+	10.7	OZ/A	PRE	A	92 a	81 ab	75 ab	0 b
AUTHORITY	3.2	OZ/A	PRE	A				
SENCOR+	10.7	OZ/A	POS3"NS	B				6 b
AUTHORITY	3.2	OZ/A	POS3"NS	B				
LSD (P=.05)					28.6	30.5	26.3	50
CV					26.74	47.37	35.84	378.09

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

HERBICIDE PROGRAMS FOR POTATOES

Trial ID: MATRIXPOT 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	9	10	11	12
Weed Code					AMBEL	AMBTR	AGRASS	POLPY
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					COUNT	COUNT	COUNT	COUNT
Rating Unit					PER PLOT	PER PLOT	PER PLOT	PER PLOT
Rating Date					5/28/2002	5/28/2002	5/28/2002	5/28/2002
UNTREATED CONTROL					7 a	1 abc	6 a	157 a
LOROX +	1.5	LB/A	PRE	A	0 b	1 abc	1 b	1 b
MATRIX	1.5	OZ/A	PRE	A				
LOROX +	1.5	LB/A	PRE	A	0 b	1 abc	1 b	6 b
MATRIX +	1	OZ/A	POST	B				
SENCOR +	2	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
MATRIX +	1.5	OZ/A	POST REG	C				
COC	1.6	PT/A	POST REG	C				
LOROX	1.5	LB/A	PRE	A	0 b	0 c	1 b	0 b
MATRIX +	1.5	OZ/A	POST	B				
SENCOR +	4	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
LOROX	1.5	LB/A	PRE	A	0 b	0 c	2 b	1 b
MATRIX +	1.5	OZ/A	POST	B				
SENCOR +	2	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
DUAL MAGNUM +	1.57	PT/A	PRE	A	0 b	1 abc	1 b	0 b
SENCOR	9.5	OZ/A	PRE	A				
DEFINE	16	OZ/A	PRE	A	0 b	0 bc	2 ab	5 b
AUTHORITY	3.2	OZ/A	PRE	A	1 b	1 abc	1 b	4 b
DEFINE+	16	OZ/A	PRE	A	0 b	2 a	0 b	0 b
SENCOR	10.7	OZ/A	PRE	A				
DEFINE+	16	OZ/A	PRE	A	0 b	1 ab	0 b	1 b
AUTHORITY	3.2	OZ/A	PRE	A				
SENCOR+	10.7	OZ/A	PRE	A	0 b	0 c	0 b	0 b
AUTHORITY	3.2	OZ/A	PRE	A				
SENCOR+	10.7	OZ/A	POS3"NS	B	0 b	0 c	1 b	7 b
AUTHORITY	3.2	OZ/A	POS3"NS	B				
LSD (P=.05)					5.6	1.2	4.2	47.2
CV					579.58	166.97	264.76	217.25

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

HERBICIDE PROGRAMS FOR POTATOES

Trial ID: MATRIXPOT 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					CYPES	TAROF		CHEAL
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	PLANT	WEED
Rating Data Type					COUNT	COUNT	INJURY	CONTROL
Rating Unit					PER PLOT	PER PLOT	PERCENT	PERCENT
Rating Date					5/28/2002	5/28/2002	6/7/2002	6/7/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	13	14	15	16
UNTREATED CONTROL					40 ab	2 ab	0 a	0 c
LOROX +	1.5	LB/A	PRE	A	34 abc	0 b	0 a	99 a
MATRIX	1.5	OZ/A	PRE	A				
LOROX +	1.5	LB/A	PRE	A	28 abc	1 b	0 a	82 b
MATRIX +	1	OZ/A	POST	B				
SENCOR +	2	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
MATRIX +	1.5	OZ/A	POST REG	C				
COC	1.6	PT/A	POST REG	C				
LOROX	1.5	LB/A	PRE	A	39 ab	0 b	0 a	99 a
MATRIX +	1.5	OZ/A	POST	B				
SENCOR +	4	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
LOROX	1.5	LB/A	PRE	A	55 a	0 b	0 a	98 a
MATRIX +	1.5	OZ/A	POST	B				
SENCOR +	2	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
DUAL MAGNUM +	1.57	PT/A	PRE	A	1 c	1 b	0 a	98 a
SENCOR	9.5	OZ/A	PRE	A				
DEFINE	16	OZ/A	PRE	A	9 bc	5 a	0 a	98 a
AUTHORITY	3.2	OZ/A	PRE	A	23 abc	2 ab	0 a	99 a
DEFINE+	16	OZ/A	PRE	A	20 bc	1 b	0 a	99 a
SENCOR	10.7	OZ/A	PRE	A				
DEFINE+	16	OZ/A	PRE	A	15 bc	0 b	0 a	99 a
AUTHORITY	3.2	OZ/A	PRE	A				
SENCOR+	10.7	OZ/A	PRE	A	21 bc	0 b	0 a	99 a
AUTHORITY	3.2	OZ/A	PRE	A				
SENCOR+	10.7	OZ/A	POS3"NS	B	23 abc	0 b		
AUTHORITY	3.2	OZ/A	POS3"NS	B				
LSD (P=.05)					33.6	2.6	0	9.7
CV					90.91	193.97	0	7.63

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

HERBICIDE PROGRAMS FOR POTATOES

Trial ID: MATRIXPOT 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					AMBEL	AMBTR	AGRASS	POLPY	CIRAR
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED	WEED
Rating Data Type					CONTROL	CONTROL	CONTROL	CONTROL	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/7/2002	6/7/2002	6/7/2002	6/7/2002	6/7/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	17	18	19	20	21
UNTREATED CONTROL					0 c	0 c	0 b	0 c	0 b
LOROX +	1.5	LB/A	PRE	A	83 b	97 ab	99 a	95 a	58 a
MATRIX	1.5	OZ/A	PRE	A					
LOROX +	1.5	LB/A	PRE	A	87 ab	80 b	96 a	73 b	61 a
MATRIX +	1	OZ/A	POST	B					
SENCOR +	2	OZ/A	POST	B					
NIS	0.4	PT/A	POST	B					
MATRIX +	1.5	OZ/A	POST REG	C					
COC	1.6	PT/A	POST REG	C					
LOROX	1.5	LB/A	PRE	A	98 a	99 a	99 a	97 a	96 a
MATRIX +	1.5	OZ/A	POST	B					
SENCOR +	4	OZ/A	POST	B					
NIS	0.4	PT/A	POST	B					
LOROX	1.5	LB/A	PRE	A	99 a	99 a	96 a	94 a	76 a
MATRIX +	1.5	OZ/A	POST	B					
SENCOR +	2	OZ/A	POST	B					
NIS	0.4	PT/A	POST	B					
DUAL MAGNUM ·	1.57	PT/A	PRE	A	99 a	97 ab	99 a	99 a	92 a
SENCOR	9.5	OZ/A	PRE	A					
DEFINE	16	OZ/A	PRE	A	97 a	87 ab	99 a	95 a	77 a
AUTHORITY	3.2	OZ/A	PRE	A	95 ab	86 ab	99 a	90 a	81 a
DEFINE+	16	OZ/A	PRE	A	98 a	96 ab	99 a	99 a	90 a
SENCOR	10.7	OZ/A	PRE	A					
DEFINE+	16	OZ/A	PRE	A	99 a	87 ab	99 a	99 a	79 a
AUTHORITY	3.2	OZ/A	PRE	A					
SENCOR+	10.7	OZ/A	PRE	A	99 a	92 ab	99 a	99 a	72 a
AUTHORITY	3.2	OZ/A	PRE	A					
SENCOR+	10.7	OZ/A	POS3"NS	B					
AUTHORITY	3.2	OZ/A	POS3"NS	B					
LSD (P=.05)					13	18.6	4.1	11.6	45.8
CV					10.41	15.43	3.17	9.39	44.75

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

HERBICIDE PROGRAMS FOR POTATOES

Trial ID: MATRIXPOT 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					CYPES	CHEAL	AMBEL	AMBTR
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					CONTROL	COUNT	COUNT	COUNT
Rating Unit					PERCENT	PER PLOT	PER PLOT	PER PLOT
Rating Date					6/7/2002	6/20/2002	6/20/2002	6/20/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	22	23	24	25
UNTREATED CONTROL					0 e	8 a	1 a	0 b
LOROX +	1.5	LB/A	PRE	A	66 bcd	0 c	0 b	0 b
MATRIX	1.5	OZ/A	PRE	A				
LOROX +	1.5	LB/A	PRE	A	56 cd	1 bc	0 b	0 ab
MATRIX +	1	OZ/A	POST	B				
SENCOR +	2	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
MATRIX +	1.5	OZ/A	POST REG	C				
COC	1.6	PT/A	POST REG	C				
LOROX	1.5	LB/A	PRE	A	61 bcd	0 c	0 b	0 b
MATRIX +	1.5	OZ/A	POST	B				
SENCOR +	4	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
LOROX	1.5	LB/A	PRE	A	46 d	0 c	0 b	0 b
MATRIX +	1.5	OZ/A	POST	B				
SENCOR +	2	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
DUAL MAGNUM ·	1.57	PT/A	PRE	A	96 a	0 c	0 b	0 ab
SENCOR	9.5	OZ/A	PRE	A				
DEFINE	16	OZ/A	PRE	A	74 abc	0 c	0 b	0 ab
AUTHORITY	3.2	OZ/A	PRE	A	71 bc	0 c	0 b	0 ab
DEFINE+	16	OZ/A	PRE	A	80 abc	0 c	0 b	0 a
SENCOR	10.7	OZ/A	PRE	A				
DEFINE+	16	OZ/A	PRE	A	83 ab	0 c	0 b	0 ab
AUTHORITY	3.2	OZ/A	PRE	A				
SENCOR+	10.7	OZ/A	PRE	A	81 ab	0 c	0 b	0 b
AUTHORITY	3.2	OZ/A	PRE	A				
SENCOR+	10.7	OZ/A	POS3"NS	B		5 ab	0 b	0 b
AUTHORITY	3.2	OZ/A	POS3"NS	B				
LSD (P=.05)					24	4.6	0.7	0.4
CV					25.59	270.72	280.67	236.45

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

HERBICIDE PROGRAMS FOR POTATOES

Trial ID: MATRIXPOT 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					AGRASS	POLPY	CYPES	
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					COUNT	COUNT	COUNT	CONTROL
Rating Unit					PER PLOT	PER PLOT	PER PLOT	PERCENT
Rating Date					6/20/2002	6/20/2002	6/20/2002	6/21/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	26	27	28	29
UNTREATED CONTROL					2 a	37 a	2 cd	0 b
LOROX +	1.5	LB/A	PRE	A	1 b	0 b	12 a	0 b
MATRIX	1.5	OZ/A	PRE	A				
LOROX +	1.5	LB/A	PRE	A	0 b	0 b	6 bc	0 b
MATRIX +	1	OZ/A	POST	B				
SENCOR +	2	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
MATRIX +	1.5	OZ/A	POST REG	C				
COC	1.6	PT/A	POST REG	C				
LOROX	1.5	LB/A	PRE	A	0 b	0 b	7 abc	0 b
MATRIX +	1.5	OZ/A	POST	B				
SENCOR +	4	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
LOROX	1.5	LB/A	PRE	A	1 b	0 b	10 ab	0 b
MATRIX +	1.5	OZ/A	POST	B				
SENCOR +	2	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
DUAL MAGNUM +	1.57	PT/A	PRE	A	0 b	0 b	1 d	0 b
SENCOR	9.5	OZ/A	PRE	A				
DEFINE	16	OZ/A	PRE	A	0 b	1 b	3 cd	0 b
AUTHORITY	3.2	OZ/A	PRE	A	0 b	1 b	9 ab	0 b
DEFINE+	16	OZ/A	PRE	A	0 b	0 b	7 abc	0 b
SENCOR	10.7	OZ/A	PRE	A				
DEFINE+	16	OZ/A	PRE	A	0 b	0 b	6 bcd	0 b
AUTHORITY	3.2	OZ/A	PRE	A				
SENCOR+	10.7	OZ/A	PRE	A	0 b	0 b	7 bc	0 b
AUTHORITY	3.2	OZ/A	PRE	A				
SENCOR+	10.7	OZ/A	POS3"NS	B	0 b	0 b	6 bcd	53 a
AUTHORITY	3.2	OZ/A	POS3"NS	B				
LSD (P=.05)					1	12.4	5.3	5
CV					231.64	257.41	56.36	78.54

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

HERBICIDE PROGRAMS FOR POTATOES

Trial ID: MATRIXPOT 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					CHEAL	AMBEL	AMBTR	AGRASS
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					CONTROL	CONTROL	CONTROL	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/21/2002	6/21/2002	6/21/2002	6/21/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	30	31	32	33
UNTREATED CONTROL					0 c	0 b	0 c	0 c
LOROX +	1.5	LB/A	PRE	A	99 a	97 a	93 a	99 a
MATRIX	1.5	OZ/A	PRE	A				
LOROX +	1.5	LB/A	PRE	A	97 a	94 a	85 ab	99 a
MATRIX +	1	OZ/A	POST	B				
SENCOR +	2	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
MATRIX +	1.5	OZ/A	POST REG	C				
COC	1.6	PT/A	POST REG	C				
LOROX	1.5	LB/A	PRE	A	99 a	99 a	98 a	99 a
MATRIX +	1.5	OZ/A	POST	B				
SENCOR +	4	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
LOROX	1.5	LB/A	PRE	A	99 a	99 a	99 a	79 b
MATRIX +	1.5	OZ/A	POST	B				
SENCOR +	2	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
DUAL MAGNUM ·	1.57	PT/A	PRE	A	99 a	99 a	98 a	99 a
SENCOR	9.5	OZ/A	PRE	A				
DEFINE	16	OZ/A	PRE	A	91 b	99 a	75 ab	99 a
AUTHORITY	3.2	OZ/A	PRE	A	99 a	89 a	61 b	99 a
DEFINE+	16	OZ/A	PRE	A	99 a	99 a	79 ab	99 a
SENCOR	10.7	OZ/A	PRE	A				
DEFINE+	16	OZ/A	PRE	A	98 a	98 a	77 ab	99 a
AUTHORITY	3.2	OZ/A	PRE	A				
SENCOR+	10.7	OZ/A	PRE	A	99 a	96 a	96 a	98 a
AUTHORITY	3.2	OZ/A	PRE	A				
SENCOR+	10.7	OZ/A	POS3"NS	B	89 b	99 a	99 a	92 ab
AUTHORITY	3.2	OZ/A	POS3"NS	B				
LSD (P=.05)					5.1	9.9	30.7	17.7
CV					3.97	7.68	26.59	13.89

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

HERBICIDE PROGRAMS FOR POTATOES

Trial ID: MATRIXPOT 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					POLPY	CYPES		CHEAL
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	PLANT	WEED
Rating Data Type					CONTROL	CONTROL	INJURY	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/21/2002	6/21/2002	7/3/2002	7/3/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	34	35	36	37
UNTREATED CONTROL					0 d	0 e	0 b	0 c
LOROX +	1.5	LB/A	PRE	A	99 a	1 e	0 b	99 a
MATRIX	1.5	OZ/A	PRE	A				
LOROX +	1.5	LB/A	PRE	A	99 a	20 bc	0 b	99 a
MATRIX +	1	OZ/A	POST	B				
SENCOR +	2	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
MATRIX +	1.5	OZ/A	POST REG	C				
COC	1.6	PT/A	POST REG	C				
LOROX	1.5	LB/A	PRE	A	99 a	24 b	0 b	99 a
MATRIX +	1.5	OZ/A	POST	B				
SENCOR +	4	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
LOROX	1.5	LB/A	PRE	A	99 a	18 bc	0 b	99 a
MATRIX +	1.5	OZ/A	POST	B				
SENCOR +	2	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
DUAL MAGNUM +	1.57	PT/A	PRE	A	98 a	94 a	0 b	99 a
SENCOR	9.5	OZ/A	PRE	A				
DEFINE	16	OZ/A	PRE	A	81 c	14 bcd	0 b	92 b
AUTHORITY	3.2	OZ/A	PRE	A	81 c	4 de	0 b	98 a
DEFINE+	16	OZ/A	PRE	A	99 a	11 cde	0 b	99 a
SENCOR	10.7	OZ/A	PRE	A				
DEFINE+	16	OZ/A	PRE	A	91 b	14 bcd	0 b	99 a
AUTHORITY	3.2	OZ/A	PRE	A				
SENCOR+	10.7	OZ/A	PRE	A	99 a	10 cde	0 b	99 a
AUTHORITY	3.2	OZ/A	PRE	A				
SENCOR+	10.7	OZ/A	POS3"NS	B	99 a	8 cde	23 a	92 b
AUTHORITY	3.2	OZ/A	POS3"NS	B				
LSD (P=.05)					6.4	12.5	2.1	5.2
CV					5.09	47.86	76.98	3.99

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

HERBICIDE PROGRAMS FOR POTATOES

Trial ID: MATRIXPOT 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					AMBEL	AMBTR	AGRASS	POLPY	CYPES
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED	WEED
Rating Data Type					CONTROL	CONTROL	CONTROL	CONTROL	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/3/2002	7/3/2002	7/3/2002	7/3/2002	7/3/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	38	39	40	41	42
UNTREATED CONTROL					0 b	0 c	0 c	0 c	0 e
LOROX +	1.5	LB/A	PRE	A	99 a	92 ab	96 a	93 a	69 a-d
MATRIX	1.5	OZ/A	PRE	A					
LOROX +	1.5	LB/A	PRE	A	92 a	99 a	99 a	99 a	91 a
MATRIX +	1	OZ/A	POST	B					
SENCOR +	2	OZ/A	POST	B					
NIS	0.4	PT/A	POST	B					
MATRIX +	1.5	OZ/A	POST REG	C					
COC	1.6	PT/A	POST REG	C					
LOROX	1.5	LB/A	PRE	A	99 a	92 ab	99 a	99 a	91 a
MATRIX +	1.5	OZ/A	POST	B					
SENCOR +	4	OZ/A	POST	B					
NIS	0.4	PT/A	POST	B					
LOROX	1.5	LB/A	PRE	A	99 a	99 a	96 a	96 a	84 abc
MATRIX +	1.5	OZ/A	POST	B					
SENCOR +	2	OZ/A	POST	B					
NIS	0.4	PT/A	POST	B					
DUAL MAGNUM +	1.57	PT/A	PRE	A	99 a	99 a	99 a	99 a	92 a
SENCOR	9.5	OZ/A	PRE	A					
DEFINE	16	OZ/A	PRE	A	92 a	87 ab	94 a	93 a	64 bcd
AUTHORITY	3.2	OZ/A	PRE	A	82 a	77 b	59 b	79 b	53 d
DEFINE+	16	OZ/A	PRE	A	82 a	75 b	99 a	99 a	78 abc
SENCOR	10.7	OZ/A	PRE	A					
DEFINE+	16	OZ/A	PRE	A	82 a	87 ab	96 a	96 a	60 cd
AUTHORITY	3.2	OZ/A	PRE	A					
SENCOR+	10.7	OZ/A	PRE	A	99 a	99 a	99 a	99 a	71 a-d
AUTHORITY	3.2	OZ/A	PRE	A					
SENCOR+	10.7	OZ/A	POS3"NS	B	96 a	99 a	91 a	96 a	86 ab
AUTHORITY	3.2	OZ/A	POS3"NS	B					
LSD (P=.05)					19.3	21.4	15	11	23.7
CV					15.71	17.69	12.2	8.71	23.5

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

HERBICIDE PROGRAMS FOR POTATOES

Trial ID: MATRIXPOT 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code						CHEAL	AMBEL	AMBTR
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					PLANT	WEED	WEED	WEED
Rating Data Type					INJURY	CONTROL	CONTROL	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/17/2002	7/17/2002	7/17/2002	7/17/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	43	44	45	46
UNTREATED CONTROL					0 b	0 c	0 c	0 c
LOROX +	1.5	LB/A	PRE	A	0 b	99 a	87 ab	62 ab
MATRIX	1.5	OZ/A	PRE	A				
LOROX +	1.5	LB/A	PRE	A	0 b	88 a	76 ab	77 ab
MATRIX +	1	OZ/A	POST	B				
SENCOR +	2	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
MATRIX +	1.5	OZ/A	POST REG	C				
COC	1.6	PT/A	POST REG	C				
LOROX	1.5	LB/A	PRE	A	0 b	99 a	82 ab	81 ab
MATRIX +	1.5	OZ/A	POST	B				
SENCOR +	4	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
LOROX	1.5	LB/A	PRE	A	0 b	87 a	87 ab	93 a
MATRIX +	1.5	OZ/A	POST	B				
SENCOR +	2	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
DUAL MAGNUM +	1.57	PT/A	PRE	A	0 b	99 a	99 a	99 a
SENCOR	9.5	OZ/A	PRE	A				
DEFINE	16	OZ/A	PRE	A	0 b	57 b	61 b	45 b
AUTHORITY	3.2	OZ/A	PRE	A	0 b	99 a	62 b	60 ab
DEFINE+	16	OZ/A	PRE	A	0 b	99 a	99 a	67 ab
SENCOR	10.7	OZ/A	PRE	A				
DEFINE+	16	OZ/A	PRE	A	0 b	99 a	81 ab	68 ab
AUTHORITY	3.2	OZ/A	PRE	A				
SENCOR+	10.7	OZ/A	PRE	A	0 b	99 a	81 ab	79 ab
AUTHORITY	3.2	OZ/A	PRE	A				
SENCOR+	10.7	OZ/A	POS3"NS	B	10 a	55 b	99 a	87 ab
AUTHORITY	3.2	OZ/A	POS3"NS	B				
LSD (P=.05)					2.9	22.1	31.1	42.4
CV					244.95	18.77	28.31	43.14

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

HERBICIDE PROGRAMS FOR POTATOES

Trial ID: MATRIXPOT 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					AGRASS	POLPY	CYPES	CIRAR
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					CONTROL	CONTROL	CONTROL	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/17/2002	7/17/2002	7/17/2002	7/17/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	47	48	49	50
UNTREATED CONTROL					0 c	0 d	0 d	0 d
LOROX +	1.5	LB/A	PRE	A	99 a	93 a	36 c	31 bcd
MATRIX	1.5	OZ/A	PRE	A				
LOROX +	1.5	LB/A	PRE	A	98 a	93 a	74 ab	50 abc
MATRIX +	1	OZ/A	POST	B				
SENCOR +	2	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
MATRIX +	1.5	OZ/A	POST REG	C				
COC	1.6	PT/A	POST REG	C				
LOROX	1.5	LB/A	PRE	A	99 a	99 a	75 ab	74 ab
MATRIX +	1.5	OZ/A	POST	B				
SENCOR +	4	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
LOROX	1.5	LB/A	PRE	A	99 a	93 a	44 bc	25 cd
MATRIX +	1.5	OZ/A	POST	B				
SENCOR +	2	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
DUAL MAGNUM +	1.57	PT/A	PRE	A	99 a	99 a	82 a	56 abc
SENCOR	9.5	OZ/A	PRE	A				
DEFINE	16	OZ/A	PRE	A	99 a	56 b	53 abc	75 ab
AUTHORITY	3.2	OZ/A	PRE	A	94 a	29 c	45 bc	87 a
DEFINE+	16	OZ/A	PRE	A	99 a	96 a	49 abc	51 abc
SENCOR	10.7	OZ/A	PRE	A				
DEFINE+	16	OZ/A	PRE	A	97 a	92 a	31 cd	36 bcd
AUTHORITY	3.2	OZ/A	PRE	A				
SENCOR+	10.7	OZ/A	PRE	A	99 a	99 a	47 abc	62 abc
AUTHORITY	3.2	OZ/A	PRE	A				
SENCOR+	10.7	OZ/A	POS3"NS	B	83 b	94 a	49 abc	56 abc
AUTHORITY	3.2	OZ/A	POS3"NS	B				
LSD (P=.05)					10.3	18.2	35.6	43.8
CV					8.04	16.07	50.78	60.52

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

HERBICIDE PROGRAMS FOR POTATOES

Trial ID: MATRIXPOT 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					CHEAL	AMBEL	AMBTR	AGRASS
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					CONTROL	CONTROL	CONTROL	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					9/3/2002	9/3/2002	9/3/2002	9/3/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	51	52	53	54
UNTREATED CONTROL					0 d	0 b	0 b	0 b
LOROX +	1.5	LB/A	PRE	A	70 bc	87 a	87 a	87 a
MATRIX	1.5	OZ/A	PRE	A				
LOROX +	1.5	LB/A	PRE	A	68 bc	84 a	80 a	85 a
MATRIX +	1	OZ/A	POST	B				
SENCOR +	2	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
MATRIX +	1.5	OZ/A	POST REG	C				
COC	1.6	PT/A	POST REG	C				
LOROX	1.5	LB/A	PRE	A	73 bc	92 a	88 a	76 a
MATRIX +	1.5	OZ/A	POST	B				
SENCOR +	4	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
LOROX	1.5	LB/A	PRE	A	58 c	92 a	92 a	85 a
MATRIX +	1.5	OZ/A	POST	B				
SENCOR +	2	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
DUAL MAGNUM ·	1.57	PT/A	PRE	A	84 ab	89 a	89 a	89 a
SENCOR	9.5	OZ/A	PRE	A				
DEFINE	16	OZ/A	PRE	A	66 bc	92 a	72 a	88 a
AUTHORITY	3.2	OZ/A	PRE	A	97 a	80 a	67 a	82 a
DEFINE+	16	OZ/A	PRE	A	80 ab	92 a	79 a	82 a
SENCOR	10.7	OZ/A	PRE	A				
DEFINE+	16	OZ/A	PRE	A	98 a	84 a	72 a	92 a
AUTHORITY	3.2	OZ/A	PRE	A				
SENCOR+	10.7	OZ/A	PRE	A	96 a	82 a	77 a	84 a
AUTHORITY	3.2	OZ/A	PRE	A				
SENCOR+	10.7	OZ/A	POS3"NS	B	71 bc	90 a	87 a	75 a
AUTHORITY	3.2	OZ/A	POS3"NS	B				
LSD (P=.05)					18.5	17	26.4	17.8
CV					17.94	14.65	24.67	16.07

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

HERBICIDE PROGRAMS FOR POTATOES

Trial ID: MATRIXPOT 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	55	56	57	58
Weed Code					POLPY	CYPES	CIRAR	AMAXX
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					CONTROL	CONTROL	CONTROL	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					9/3/2002	9/3/2002	9/3/2002	9/3/2002
UNTREATED CONTROL					0 d	0 e	0 c	0 d
LOROX +	1.5	LB/A	PRE	A	81 b	50 d	71 ab	72 abc
MATRIX	1.5	OZ/A	PRE	A				
LOROX +	1.5	LB/A	PRE	A	96 a	55 cd	92 a	87 ab
MATRIX +	1	OZ/A	POST	B				
SENCOR +	2	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
MATRIX +	1.5	OZ/A	POST REG	C				
COC	1.6	PT/A	POST REG	C				
LOROX	1.5	LB/A	PRE	A	99 a	58 bcd	92 a	80 abc
MATRIX +	1.5	OZ/A	POST	B				
SENCOR +	4	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
LOROX	1.5	LB/A	PRE	A	96 a	50 d	75 ab	65 bc
MATRIX +	1.5	OZ/A	POST	B				
SENCOR +	2	OZ/A	POST	B				
NIS	0.4	PT/A	POST	B				
DUAL MAGNUM +	1.57	PT/A	PRE	A	99 a	81 a	57 ab	91 a
SENCOR	9.5	OZ/A	PRE	A				
DEFINE	16	OZ/A	PRE	A	58 c	70 abc	80 a	63 c
AUTHORITY	3.2	OZ/A	PRE	A	48 c	70 abc	75 ab	90 a
DEFINE+	16	OZ/A	PRE	A	96 a	69 abc	38 bc	84 abc
SENCOR	10.7	OZ/A	PRE	A				
DEFINE+	16	OZ/A	PRE	A	91 ab	66 abc	60 ab	95 a
AUTHORITY	3.2	OZ/A	PRE	A				
SENCOR+	10.7	OZ/A	PRE	A	94 ab	71 ab	71 ab	74 abc
AUTHORITY	3.2	OZ/A	PRE	A				
SENCOR+	10.7	OZ/A	POS3"NS	B	99 a	69 abc	75 ab	77 abc
AUTHORITY	3.2	OZ/A	POS3"NS	B				
LSD (P=.05)					13.3	15.7	38.4	22.4
CV					11.57	18.43	40.75	21.27

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

HERBICIDE PROGRAMS FOR POTATOES

Trial ID: MATRIXPOT 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code							
Crop Code					SOLTU	SOLTU	SOLTU
Part Rated					"A"'S	"B"'S	CULLS
Rating Data Type					YIELD	YIELD	YIELD
Rating Unit					CWT./A.	CWT./A.	CWT./A.
Rating Date					9/20/2002	9/20/2002	9/20/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	62	63	64
UNTREATED CONTROL					54.7 c	18.6 bc	6.2 b
LOROX +	1.5	LB/A	PRE	A	147.3 b	20.8 abc	14.8 ab
MATRIX	1.5	OZ/A	PRE	A			
LOROX +	1.5	LB/A	PRE	A	134.2 b	22.2 abc	20.8 a
MATRIX +	1	OZ/A	POST	B			
SENCOR +	2	OZ/A	POST	B			
NIS	0.4	PT/A	POST	B			
MATRIX +	1.5	OZ/A	POST REG	C			
COC	1.6	PT/A	POST REG	C			
LOROX	1.5	LB/A	PRE	A	170.6 ab	30.5 a	12.4 ab
MATRIX +	1.5	OZ/A	POST	B			
SENCOR +	4	OZ/A	POST	B			
NIS	0.4	PT/A	POST	B			
LOROX	1.5	LB/A	PRE	A	152.9 ab	18.6 bc	10.6 b
MATRIX +	1.5	OZ/A	POST	B			
SENCOR +	2	OZ/A	POST	B			
NIS	0.4	PT/A	POST	B			
DUAL MAGNUM ·	1.57	PT/A	PRE	A	195.9 ab	21.7 abc	15.2 ab
SENCOR	9.5	OZ/A	PRE	A			
DEFINE	16	OZ/A	PRE	A	200.2 ab	22.4 abc	12.8 ab
AUTHORITY	3.2	OZ/A	PRE	A	162.6 ab	26.2 ab	8.1 b
DEFINE+	16	OZ/A	PRE	A	134 b	22.5 abc	13.4 ab
SENCOR	10.7	OZ/A	PRE	A			
DEFINE+	16	OZ/A	PRE	A	216.2 a	23.1 abc	9.1 b
AUTHORITY	3.2	OZ/A	PRE	A			
SENCOR+	10.7	OZ/A	PRE	A	178.6 ab	23.4 abc	10.9 b
AUTHORITY	3.2	OZ/A	PRE	A			
SENCOR+	10.7	OZ/A	POS3"NS	B	166.3 ab	14.6 c	12.4 ab
AUTHORITY	3.2	OZ/A	POS3"NS	B			
LSD (P=.05)					68.41	10.49	9.24
CV					29.71	32.96	52.35

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

POTATOES- PERFORMANCE OF SANDEA

Trial ID: SANPOTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

COOPERATOR/LANDOWNER

Cooperator: Paul McMillen, Farm Manager Country: USA
Org: OARDC Phone No: 330-264-7008
Address 1: East Badger Farm,Ely Road
City: Wooster
State/Prov: Ohio
Postal Code: 44691

Conducted Under GLP (Y/N): N Conducted Under GEP (Y/N): N

Objective: To collect weed efficacy and crop phytotoxicity data to support pesticide registration according to parameters outlined in the request.

CROP AND WEED DESCRIPTION

Weed	Code	Common Name	Scientific Name
1	CHEAL	common lambsquarter	Chenopodium album L.
2	CIRAR	Canada thistle	Cirsium arvense (L.)Scop.
3	AMBEL	common ragweed	Ambrosia artemisifolia L.
4	AMBTR	giant ragweed	Ambrosia trifida L.
5	TAROF	common dandelion	Taraxacum officinale (Weber in Wiggers)
6	AGRASS	annual grasses	various spp.
7	POLPY	Pennsylvania smartweed	Polygonum pensylvanicum L.
8	CYPES	yellow nutsedge	Cyperus esculentus L.
9	TRFRE	white clover	Trifolium repens L.
10	OXAST	yellow woodsorrel	Oxalis stricta L.
11	THLAR	field pennycress	Thlaspi arvense L.

Crop 1: SOLTU POTATO Variety: RED NORLAND
Planting Date: 05/01/02 Planting Method: CONVENTIONAL
Rate: 15 CWT./A Depth: 3 IN
Row Spacing: 36 IN. Seed Bed: CONVENTIONAL
Emergence Date: 06/01/02

SITE AND DESIGN

Plot Width, Unit: 10 FT Plot Length, Unit: 20 FT Reps: 4
Site Type: LEVEL FIELD
Tillage Type: CONVENTIONAL Study Design: RANDOMIZED COMPLETE BLOCK

MAINTENANCE

Field Prep./Maintenance: Plowed, disced late April. Fertilized with 1200#/A. (10-20-20); 600# preplant disc-in, and the remainder at planting. Used "Admire"(at planting) for insect control. Applied recommmended fungicides and insecticides throughout growing season. Harvested potatoes commercially on 9/20.

SOIL DESCRIPTION

% Sand: 11 % OM: 3 Texture: SILT LOAM
% Silt: 75 pH: 6.0 Soil Name: WOOSTER SILT LOAM
% Clay: 14 CEC: 13 Fert. Level: MODERATE

APPLICATION DESCRIPTION

	A	B
Application Date:	5/6/2002	6/5/2002
Time of Day:	11-12AM	10-11AM
Application Method:	SPRAY	SPRAY
Application Timing:	PRE	POST
Applic. Placement:	BDCST.	BDCST
Air Temp., Unit:	60 F	70 F
% Relative Humidity:	79	89
Wind Velocity, Unit:	3 MPH	2 MPH
Dew Presence (Y/N):	N	N
Soil Moisture:	MOIST	MOIST
% Cloud Cover:	70	30

CROP STAGE AT EACH APPLICATION

	A	B
Crop 1 Code, Stage:	SOLTU PRE	SOLTU POST
Stage Scale:	NONE	VEGETAT.
Height, Unit:	0 INCH	6 INCH

WEED STAGE AT EACH APPLICATION

	A	B
Weed 1 Code, Stage:	CHEAL PRE	CHEAL POST
Stage Scale:	.	2-4" TALL
Density, Unit:	. .	MED.
Weed 2 Code, Stage:	CIRAR PRE	CIRAR
Stage Scale:	.	2-4" TALL
Density, Unit:	. .	LOW
Weed 3 Code, Stage:	AMBEL PRE	AMBEL
Stage Scale:	.	2-4" TALL
Density, Unit:	. .	LOW
Weed 4 Code, Stage:	AMBTR PRE	AMBTR
Stage Scale:	.	2-4" TALL
Density, Unit:	. .	LOW
Weed 5 Code, Stage:	TAROF PRE	TAROF
Stage Scale:	.	2-4" DIAM
Density, Unit:	. .	LOW
Weed 6 Code, Stage:	AGRAS PRE	AGRAS
Stage Scale:	.	2-4" TALL
Density, Unit:	. .	MED.
Weed 7 Code, Stage:	POLPY PRE	POLPY
Stage Scale:	.	2-4" TALL
Density, Unit:	. .	MED.
Weed 8 Code, Stage:	CYPES PRE	CYPES
Stage Scale:	.	1-2" TALL
Density, Unit:	. .	MED.
Weed 9 Code, Stage:	TRFRE PRE	TRFRE POST
Stage Scale:	.	1-2" TALL
Density, Unit:	. .	LOW
Weed10 Code, Stage:	OXAST PRE	OXAST POST
Stage Scale:	.	2-4" TALL
Density, Unit:	. .	LOW
Weed11 Code, Stage:	THLAR PRE	THLAR POST
Stage Scale:	.	2-4" TALL
Density, Unit:	. .	LOW

APPLICATION EQUIPMENT

	A	B
Appl. Equipment:	CO2 PLOT	CO2 PLOT
Operating Pressure:	35 PSI	35 PSI
Nozzle Type:	FLAT FAN	FLAT FAN
Nozzle Size:	8002 VS	8002 VS
Nozzle Spacing, Unit:	12 IN.	12 IN.
Nozzles/Row:	10	10
Band Width, Unit:	10 FT.	10 FT.
Boom Height, Unit:	18 IN.	18 IN.
Ground Speed, Unit:	4 MPH	4 MPH
Carrier:	WATER	WATER

The Ohio State University

POTATOES- PERFORMANCE OF SANDEA

Trial ID: SANPOTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Trial Comments

The Sandea used was (lot # hlsbo2002; EPA .REG.#10163-254; EPA .EST. 11773-1a-1). The field used was fallow in 2001. The potatoes used in the trial were "Red Norland"; Minnesota certified seed potatoes, crop of 2001, size "b". We experienced a severe drought this summer which impacted plant growth and yield. Yields were taken from one row, 20' in length.

The marketable grade potatoes were seperated by size, (diameter), into an "A" or "B" class:
"A"= USDA STD. #1 ; 1 7/8 " or >
"B"= 1.78 " or <
"CULL"= misshapen, diseased, or otherwise unmarketable.

The Ohio State University

POTATOES- PERFORMANCE OF SANDEA

Trial ID: SANPOTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					AGRASS	CYPES	POLPY	CHEAL	AMBTR
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED	WEED
Rating Data Type					RATING	RATING	RATING	RATING	RATING
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					5/22/2002	5/22/2002	5/22/2002	5/22/2002	5/22/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	1	2	3	4	5
UNTREATED CONTROL					0 d	0 c	0 c	0 b	0 d
WEED FREE CONTROL					99 a	99 a	99 a	99 a	99 a
SANDEA	14.5	G/A	PRE	A	85 bc	73 b	43 b	99 a	74 c
SANDEA	29	G/A	PRE	A	95 ab	98 a	46 b	96 a	91 ab
SANDEA	14.5	G/A	POS6"YNS	B					
SANDEA	29	G/A	POS6"YNS	B					
SANDEA + SANDEA	14.5 14.5	G/A G/A	PRE POS6"YNS	A B	81 c	81 b	55 b	99 a	82 bc
LSD (P=.05)					11.5	14.9	32.1	4.8	14.7
CV					10.39	13.78	42.92	3.99	13.82

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

POTATOES- PERFORMANCE OF SANDEA

Trial ID: SANPOTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					TRFRE	CIRAR	TAROF	CHEAL	AMBEL
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED	WEED
Rating Data Type					COUNT	COUNT	COUNT	COUNT	COUNT
Rating Unit					PER PLOT	PER PLOT	PER PLOT	PER PLOT	PER PLOT
Rating Date					6/5/2002	6/5/2002	6/5/2002	6/5/2002	6/5/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	6	7	8	9	10
UNTREATED CONTROL					3 b	0 a	0 a	34 a	2 a
WEED FREE CONTROL					1 b	0 a	0 a	6 bc	0 b
SANDEA	14.5	G/A	PRE	A	0 b	0 a	0 a	1 c	0 b
SANDEA	29	G/A	PRE	A	0 b	0 a	0 a	1 c	0 b
SANDEA	14.5	G/A	POS6"YNS	B	8 a	0 a	0 a	15 abc	2 a
SANDEA	29	G/A	POS6"YNS	B	3 b	0 a	0 a	29 ab	1 ab
SANDEA + SANDEA	14.5 14.5	G/A G/A	PRE POS6"YNS	A B	0 b	0 a	0 a	8 bc	0 b
LSD (P=.05)					5.2	0.2	0.5	24.4	1.6
CV					180.61	367.17	192.31	125.22	120.5

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

POTATOES- PERFORMANCE OF SANDEA

Trial ID: SANPOTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					AMBTR	POLPY	CYPES	AGRASS	CYPES
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED	WEED
Rating Data Type					COUNT	COUNT	COUNT	COUNT	RATING
Rating Unit					PER PLOT	PER PLOT	PER PLOT	PER PLOT	PERCENT
Rating Date					6/5/2002	6/5/2002	6/5/2002	6/5/2002	6/7/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	11	12	13	14	15
UNTREATED CONTROL					1 a	73 a	9 a	61 a	0 d
WEED FREE CONTROL					0 b	12 b	8 ab	4 a	99 a
SANDEA	14.5	G/A	PRE	A	0 ab	40 ab	1 b	21 a	86 c
SANDEA	29	G/A	PRE	A	0 ab	44 ab	0 b	8 a	95 ab
SANDEA	14.5	G/A	POS6"YNS	B	0 ab	78 a	11 a	11 a	0 d
SANDEA	29	G/A	POS6"YNS	B	1 a	83 a	6 ab	21 a	0 d
SANDEA + SANDEA	14.5 14.5	G/A G/A	PRE POS6"YNS	A B	0 ab	29 b	0 b	7 a	87 bc
LSD (P=.05)					0.6	44	7.9	58.7	7.7
CV					134.04	57.63	105.31	208.22	9.95

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

POTATOES- PERFORMANCE OF SANDEA

Trial ID: SANPOTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					POLPY	CHEAL	AMBEL	AMBTR
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					RATING	RATING	RATING	RATING
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/7/2002	6/7/2002	6/7/2002	6/7/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	16	17	18	19
UNTREATED CONTROL					0 c	0 d	0 b	0 d
WEED FREE CONTROL					99 a	99 a	99 a	99 a
SANDEA	14.5	G/A	PRE	A	52 b	91 b	98 a	88 bc
SANDEA	29	G/A	PRE	A	56 b	95 ab	99 a	98 ab
SANDEA	14.5	G/A	POS6"YNS	B	0 c	0 d	0 b	0 d
SANDEA	29	G/A	POS6"YNS	B	0 c	0 d	0 b	0 d
SANDEA + SANDEA	14.5 14.5	G/A G/A	PRE POS6"YNS	A B	63 b	85 c	94 a	85 c
LSD (P=.05)					27.5	5.9	5.5	10.3
CV					48.07	7.49	6.66	13.1

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

POTATOES- PERFORMANCE OF SANDEA

Trial ID: SANPOTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					TRFRE	AGRASS		CYPES
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	PLANT	WEED
Rating Data Type					RATING	RATING	INJURY	RATING
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/7/2002	6/7/2002	6/14/2002	6/14/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	20	21	22	23
UNTREATED CONTROL					0 b	0 c	0 d	0 d
WEED FREE CONTROL					99 a	99 a	0 d	99 a
SANDEA	14.5	G/A	PRE	A	97 a	54 b	0 d	83 ab
SANDEA	29	G/A	PRE	A	97 a	75 ab	0 d	88 a
SANDEA	14.5	G/A	POS6"YNS	B	0 b	0 c	41 a	61 bc
SANDEA	29	G/A	POS6"YNS	B	0 b	0 c	35 b	55 c
SANDEA + SANDEA	14.5 14.5	G/A G/A	PRE POS6"YNS	A B	99 a	72 ab	21 c	93 a
LSD (P=.05)					3.7	34	6.1	22.3
CV					4.42	53.42	29.57	21.91

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

POTATOES- PERFORMANCE OF SANDEA

Trial ID: SANPOTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					POLPY	CHEAL	AMBEL	AMBTR
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					RATING	RATING	RATING	RATING
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/14/2002	6/14/2002	6/14/2002	6/14/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	24	25	26	27
UNTREATED CONTROL					0 d	0 c	0 b	0 b
WEED FREE CONTROL					99 a	99 a	99 a	99 a
SANDEA	14.5	G/A	PRE	A	73 b	90 a	99 a	94 a
SANDEA	29	G/A	PRE	A	86 ab	95 a	99 a	97 a
SANDEA	14.5	G/A	POS6"YNS	B	54 c	53 b	99 a	98 a
SANDEA	29	G/A	POS6"YNS	B	76 b	36 b	99 a	99 a
SANDEA + SANDEA	14.5 14.5	G/A G/A	PRE POS6"YNS	A B	85 ab	93 a	99 a	99 a
LSD (P=.05)					14.3	16.9	0	5.4
CV					14.23	17.13	0	4.3

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

POTATOES- PERFORMANCE OF SANDEA

Trial ID: SANPOTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					TRFRE	AGRASS	CHEAL	AMBEL
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					RATING	RATING	COUNT	COUNT
Rating Unit					PERCENT	PERCENT	PER PLOT	PER PLOT
Rating Date					6/14/2002	6/14/2002	6/20/2002	6/20/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	28	29	30	31
UNTREATED CONTROL					0 b	0 d	17 ab	1 a
WEED FREE CONTROL					99 a	99 a	12 b	0 a
SANDEA	14.5	G/A	PRE	A	99 a	71 c	4 b	0 a
SANDEA	29	G/A	PRE	A	99 a	88 b	2 b	0 a
SANDEA	14.5	G/A	POS6"YNS	B	99 a	99 a	14 ab	0 a
SANDEA	29	G/A	POS6"YNS	B	99 a	99 a	30 a	0 a
SANDEA + SANDEA	14.5 14.5	G/A G/A	PRE POS6"YNS	A B	99 a	99 a	3 b	0 a
LSD (P=.05)					0	2	16.8	0.9
CV					0	1.73	95.78	360.56

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

POTATOES- PERFORMANCE OF SANDEA

Trial ID: SANPOTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					AMBTR	THLAR	POLPY	CYPES	TAROF
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED	WEED
Rating Data Type					COUNT	COUNT	COUNT	COUNT	COUNT
Rating Unit					PER PLOT	PER PLOT	PER PLOT	PER PLOT	PER PLOT
Rating Date					6/20/2002	6/20/2002	6/20/2002	6/20/2002	6/20/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	32	33	34	35	36
UNTREATED CONTROL					0 a	2 a	80 a	7 b	1 a
WEED FREE CONTROL					1 a	2 a	19 b	30 a	1 ab
SANDEA	14.5	G/A	PRE	A	0 a	17 a	19 b	6 b	0 ab
SANDEA	29	G/A	PRE	A	0 a	11 a	26 b	1 b	0 b
SANDEA	14.5	G/A	POS6"YNS	B	0 a	10 a	60 ab	4 b	0 ab
SANDEA	29	G/A	POS6"YNS	B	0 a	16 a	54 ab	3 b	0 ab
SANDEA + SANDEA	14.5 14.5	G/A G/A	PRE POS6"YNS	A B	1 a	10 a	18 b	0 b	0 b
LSD (P=.05)					0.7	16.1	45.7	12.3	0.6
CV					185.79	111.98	78.17	110.4	159.36

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

POTATOES- PERFORMANCE OF SANDEA

Trial ID: SANPOTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					OXAST	THLAR		CYPES
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	PLANT	WEED
Rating Data Type					COUNT	COUNT	INJURY	RATING
Rating Unit					PER PLOT	PER PLOT	PERCENT	PERCENT
Rating Date					6/20/2002	6/20/2002	6/25/2002	6/25/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	37	38	39	40
UNTREATED CONTROL					9 a	0 a	0 a	0 c
WEED FREE CONTROL					5 ab	0 a	0 a	99 a
SANDEA	14.5	G/A	PRE	A	0 c	0 a	0 a	31 bc
SANDEA	29	G/A	PRE	A	0 c	0 a	0 a	33 bc
SANDEA	14.5	G/A	POS6"YNS	B	1 bc	0 a	9 a	93 a
SANDEA	29	G/A	POS6"YNS	B	1 bc	0 a	8 a	73 ab
SANDEA + SANDEA	14.5 14.5	G/A G/A	PRE POS6"YNS	A B	0 c	0 a	0 a	72 ab
LSD (P=.05)					3.9	0.1	11.8	49.3
CV					111.89	529.15	342.98	58.11

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

POTATOES- PERFORMANCE OF SANDEA

Trial ID: SANPOTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					POLPY	CHEAL	AMBEL	AMBTR
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					RATING	RATING	RATING	RATING
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/25/2002	6/25/2002	6/25/2002	6/25/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	41	42	43	44
UNTREATED CONTROL					0 c	0 c	0 b	0 c
WEED FREE CONTROL					99 a	99 a	99 a	99 a
SANDEA	14.5	G/A	PRE	A	36 b	69 b	99 a	82 ab
SANDEA	29	G/A	PRE	A	36 b	73 b	99 a	92 ab
SANDEA	14.5	G/A	POS6"YNS	B	15 bc	9 c	99 a	81 b
SANDEA	29	G/A	POS6"YNS	B	24 bc	5 c	99 a	83 ab
SANDEA + SANDEA	14.5 14.5	G/A G/A	PRE POS6"YNS	A B	78 a	84 ab	99 a	85 ab
LSD (P=.05)					25.4	19	0	17.8
CV					41.63	26.55	0	16.06

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

POTATOES- PERFORMANCE OF SANDEA

Trial ID: SANPOTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					TRFRE	AGRASS		CYPES
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	PLANT	WEED
Rating Data Type					RATING	RATING	INJURY	RATING
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/25/2002	6/25/2002	7/3/2002	7/3/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl code	45	46	47	48
UNTREATED CONTROL					0 b	0 c	0 a	0 d
WEED FREE CONTROL					99 a	99 a	0 a	99 a
SANDEA	14.5	G/A	PRE	A	99 a	11 bc	0 a	61 c
SANDEA	29	G/A	PRE	A	98 a	30 bc	0 a	76 abc
SANDEA	14.5	G/A	POS6"YNS	B	99 a	35 bc	5 a	87 abc
SANDEA	29	G/A	POS6"YNS	B	99 a	39 b	5 a	67 bc
SANDEA + SANDEA	14.5 14.5	G/A G/A	PRE POS6"YNS	A B	98 a	13 bc	0 a	90 ab
LSD (P=.05)					1.6	37.5	7.2	26.9
CV					1.3	78.03	341.57	26.41

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

POTATOES- PERFORMANCE OF SANDEA

Trial ID: SANPOTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					POLPY	CHEAL	AMBEL	AMBTR
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					RATING	RATING	RATING	RATING
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/3/2002	7/3/2002	7/3/2002	7/3/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	49	50	51	52
UNTREATED CONTROL					0 d	0 e	0 b	0 c
WEED FREE CONTROL					99 a	99 a	99 a	99 a
SANDEA	14.5	G/A	PRE	A	46 bc	85 bc	98 a	52 b
SANDEA	29	G/A	PRE	A	58 bc	86 b	99 a	92 a
SANDEA	14.5	G/A	POS6"YNS	B	39 c	13 d	98 a	50 b
SANDEA	29	G/A	POS6"YNS	B	65 bc	5 de	99 a	65 ab
SANDEA + SANDEA	14.5 14.5	G/A G/A	PRE POS6"YNS	A B	73 ab	75 c	99 a	67 ab
LSD (P=.05)					32.5	10.2	1.4	36.1
CV					40.41	13.24	1.15	40.06

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

POTATOES- PERFORMANCE OF SANDEA

Trial ID: SANPOTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					TRFRE	AGRASS		CYPES	POLPY
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	PLANT	WEED	WEED
Rating Data Type					RATING	RATING	INJURY	RATING	RATING
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/3/2002	7/3/2002	7/17/2002	7/17/2002	7/17/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	53	54	55	56	57
UNTREATED CONTROL					0 b	0 b	0 a	0 d	0 d
WEED FREE CONTROL					99 a	99 a	0 a	99 a	99 a
SANDEA	14.5	G/A	PRE	A	99 a	80 a	0 a	45 c	11 cd
SANDEA	29	G/A	PRE	A	99 a	81 a	0 a	45 c	49 bc
SANDEA	14.5	G/A	POS6"YNS	B	99 a	84 a	0 a	63 bc	31 bcd
SANDEA	29	G/A	POS6"YNS	B	99 a	85 a	0 a	88 ab	65 ab
SANDEA + SANDEA	14.5 14.5	G/A G/A	PRE POS6"YNS	A B	99 a	85 a	0 a	63 bc	50 bc
LSD (P=.05)					0	26	0	34.3	40.5
CV					0	23.93	0	40.12	62.63

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

POTATOES- PERFORMANCE OF SANDEA

Trial ID: SANPOTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					CHEAL	AMBEL	AMBTR	A.GRASS
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					RATING	RATING	RATING	RATING
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/17/2002	7/17/2002	7/17/2002	7/17/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	58	59	60	61
UNTREATED CONTROL					0 d	0 b	0 d	0 c
WEED FREE CONTROL					99 a	99 a	99 a	99 a
SANDEA	14.5	G/A	PRE	A	71 b	99 a	30 cd	49 b
SANDEA	29	G/A	PRE	A	75 b	99 a	79 ab	79 ab
SANDEA	14.5	G/A	POS6"YNS	B	5 d	74 a	37 cd	50 b
SANDEA	29	G/A	POS6"YNS	B	0 d	99 a	52 bc	61 ab
SANDEA + SANDEA	14.5 14.5	G/A G/A	PRE POS6"YNS	A B	50 c	99 a	56 bc	62 ab
LSD (P=.05)					18.2	27.8	40.6	43.2
CV					28.53	23.01	54.16	50.98

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

POTATOES- PERFORMANCE OF SANDEA

Trial ID: SANPOTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					CIRAR	CYPES	POLPY	CHEAL
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					RATING	RATING	RATING	RATING
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/17/2002	9/3/2002	9/3/2002	9/3/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	62	63	64	65
UNTREATED CONTROL					0 b	0 c	0 d	0 d
WEED FREE CONTROL					99 a	99 a	99 a	99 a
SANDEA	14.5	G/A	PRE	A	99 a	48 b	55 c	60 b
SANDEA	29	G/A	PRE	A	92 a	58 b	65 bc	82 a
SANDEA	14.5	G/A	POS6"YNS	B	74 a	84 a	85 ab	25 c
SANDEA	29	G/A	POS6"YNS	B	99 a	90 a	82 ab	10 cd
SANDEA + SANDEA	14.5 14.5	G/A G/A	PRE POS6"YNS	A B	93 a	60 b	75 bc	53 b
LSD (P=.05)					28.9	18.4	20.4	18.7
CV					24.5	19.85	20.88	26.85

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

POTATOES- PERFORMANCE OF SANDEA

Trial ID: SANPOTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					AMBEL	AMBTR	A.GRASS	CIRAR
Crop Code					SOLTU	SOLTU	SOLTU	SOLTU
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					RATING	RATING	RATING	RATING
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					9/3/2002	9/3/2002	9/3/2002	9/3/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	66	67	68	69
UNTREATED CONTROL					0 b	0 c	0 c	0 b
WEED FREE CONTROL					99 a	99 a	99 a	99 a
SANDEA	14.5	G/A	PRE	A	87 a	75 b	76 b	93 a
SANDEA	29	G/A	PRE	A	93 a	87 ab	74 b	91 a
SANDEA	14.5	G/A	POS6"YNS	B	99 a	99 a	91 a	99 a
SANDEA	29	G/A	POS6"YNS	B	99 a	85 ab	91 a	99 a
SANDEA + SANDEA	14.5 14.5	G/A G/A	PRE POS6"YNS	A B	87 a	75 b	74 b	82 a
LSD (P=.05)					17.3	22.1	13.1	19.7
CV					14.46	20.12	12.22	16.51

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

POTATOES- PERFORMANCE OF SANDEA

Trial ID: SANPOTW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code							
Crop Code					SOLTU	SOLTU	SOLTU
Part Rated					YIELD	YIELD	YIELD
Rating Data Type					"A"'S	"B"'S	CULLS
Rating Unit					CWT./A.	CWT./A.	CWT./A.
Rating Date					9/20/2002	9/20/2002	9/20/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	73	74	75
UNTREATED CONTROL					57.1 bc	21.9 a	4.8 a
WEED FREE CONTROL					128.2 ab	28.7 a	11.3 a
SANDEA	14.5	G/A	PRE	A	115.2 abc	22.3 a	8.6 a
SANDEA	29	G/A	PRE	A	149.2 a	24 a	10.6 a
SANDEA	14.5	G/A	POS6"YNS	B	43.4 c	19.7 a	4.4 a
SANDEA	29	G/A	POS6"YNS	B	65.9 bc	20.7 a	8.6 a
SANDEA + SANDEA	14.5 14.5	G/A G/A	PRE POS6"YNS	A B	147.3 a	23.4 a	4.5 a
LSD (P=.05)					76.02	11.06	8.87
CV					50.71	32.42	79.1

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF SWEET CORN VARIETIES TO HERBICIDES

Trial ID: SCVSTRIPTRW 2002 Study Dir.: Dr.Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

COOPERATOR/LANDOWNER

Cooperator: Paul McMiller, Farm Mgr. Country: USA
Org: OARDC/ East Badger Farm Phone No: 330-264-7008
Address 1: Ely Road, Wooster,Ohio,44691
City: Wooster
State/Prov: Ohio
Postal Code: 44691

Conducted Under GLP (Y/N): N Conducted Under GEP (Y/N): N

Objective: To observe sensitivity and weed control on 16 sweet corn varieties using various herbicide combinations.

CROP AND WEED DESCRIPTION

Weed	Code	Common Name	Scientific Name
1	CHEAL	common lambsquarters	Chenopodium album L.
2	AMBEL	common ragweed	Ambrosia artemisifolia L.
3	AMBTR	giant ragweed	Ambrosia trifida L.
4	AGRASS	annual grass (various)	spp.
5	CIRAR	Canada thistle	Cirsium arvense L.(Scop.)
6	OXAST	yellow woodsorrel	Oxalis stricta L.
7	CYPES	yellow nutsedge	Cyperus esculentes L.
8	MUHSC	nimblewill	Muhlenbergia schreberi J.F.Gmel.
9	APCCA	hemp dogbane	Apocynum cannabinum L.

Crop 1: ZEAMS SWEET CORN Variety: 16 VARIETIES
Planting Date: 05/08/02 Planting Method: CONVENTIONAL
Rate: 3 SEEDS/FOOT Depth: 1.5 IN
Row Spacing: 30 INCH Seed Bed: CONVENTIONAL
Soil Temperature: 50 F Soil Moisture: MOIST

SITE AND DESIGN

Plot Width, Unit: 10 FT Plot Length, Unit: 200 FT Reps: 1
Site Type: LEVEL FIELD
Tillage Type: CONVENTIONAL Study Design: NON-RANDOMIZED

MAINTENANCE

Field Prep./Maintenance: Plowed and disked early May. Applied Dual Magnum @ 1.3qts../A., PRE. Fertilized at planting with 300#/acre, (19-19-19).

SOIL DESCRIPTION

% Sand: 11 % OM: 3 Texture: SILT LOAM
% Silt: 75 pH: 6 Soil Name: WOOSTER SILT LOAM
% Clay: 14 CEC: 13 Fert. Level: MODERATE

APPLICATION DESCRIPTION

	A
Application Date:	6/13/2002
Time of Day:	11-12AM
Application Method:	SPRAY

Application Timing: POST
Applic. Placement: BDCST.
Air Temp., Unit: 75 F
% Relative Humidity: 85
Wind Velocity, Unit: 2 MPH
Dew Presence (Y/N): N
% Cloud Cover: 75

CROP STAGE AT EACH APPLICATION

	A
Crop 1 Code, Stage:	ZEAMS POST
Stage Scale:	4-5 LF.
Height, Unit:	6 IN.

WEED STAGE AT EACH APPLICATION

	A
Weed 1 Code, Stage:	CHEAL POST
Stage Scale:	.
Density, Unit:	. .
Weed 2 Code, Stage:	AMBEL POST
Stage Scale:	.
Density, Unit:	. .
Weed 3 Code, Stage:	AMBTR POST
Stage Scale:	.
Density, Unit:	. .
Weed 4 Code, Stage:	AGRAS POST
Stage Scale:	.
Density, Unit:	. .
Weed 5 Code, Stage:	CIRAR POST
Stage Scale:	TO 6"
Density, Unit:	MED. .
Weed 6 Code, Stage:	OXAST POST
Stage Scale:	.
Density, Unit:	. .
Weed 7 Code, Stage:	CYPES POST
Stage Scale:	.
Density, Unit:	. .
Weed 8 Code, Stage:	MUHSC POST
Stage Scale:	.
Density, Unit:	. .
Weed 9 Code, Stage:	APCCA POST
Stage Scale:	.
Density, Unit:	. .

APPLICATION EQUIPMENT

	A
Appl. Equipment:	CO2 PLOT
Operating Pressure:	35 PSI
Nozzle Type:	FLAT FAN
Nozzle Size:	8002VS
Nozzle Spacing, Unit:	12 IN.
Nozzles/Row:	10
Band Width, Unit:	10 FT.
Boom Height, Unit:	18 IN.
Ground Speed, Unit:	4 MPH
Spray Volume, Unit:	20 GPA
Propellant:	CO2
Tank Mix (Y/N):	Y

The Ohio State University

SENSITIVITY OF SWEET CORN VARIETIES TO HERBICIDES

Trial ID: SCVSTRIPTRW 2002 Study Dir.: Dr.Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Trial Comments

The injury ratings taken on June 25 reflect percent of corn plant stunting, (0= none; and 100= total kill). At time of POST application, only thistles were present. Other species were present later in season. Corn heights taken on July 3 were the average of six plants measured from the soil line to the most recent fully expanded corn leaf with a collar. The weed control rating scale is the same as for the injury ratings. We experienced a severe drought this summer which seriously affected corn growth and possibly herbicide action.

cultivar list:
1) Merlin
2) Confection
3) Kandy Korner
4) Bandit
5) Silver King
6) Extra Tender
7) Seneca Daybreak
8) Ice Queen
9) Seneca Dancer
10) Sweet Rythm
11) Kandy King
12) Imaculata
13) Sensor
14) Sweet Ice
15) Morningstar
16) Temptation

The Ohio State University

SENSITIVITY OF SWEET CORN VARIETIES TO HERBICIDES

Trial ID: SCVSTRIPTRW 2002 Study Dir.: Dr.Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Crop Code					MERLIN	CONFEC	KANKOR	BANDIT	SILVRK
Part Rated					INJURY	INJURY	INJURY	INJURY	INJURY
Rating Data Type					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Unit					6/25/2002	6/25/2002	6/25/2002	6/25/2002	6/25/2002
Rating Date									
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	1	2	3	4	5
AIM +	0.33	OZ/A	POST	A	0	5	15	0	5
NIS	0.4	PT/A	POST	A					
OPTION +	1.5	OZ/A	POST	A	0	5	0	0	5
MSO+	1.5	PT/A	POST	A					
UAN	2	QT/A	POST	A					
AEF 130360 02 +	1.75	OZ/A	POST	A	0	5	0	5	0
MSO +	1.5	PT/A	POST	A					
UAN	2	QT/A	POST	A					
CALLISTO +	3	OZ/A	POST	A	5	0	5	5	0
NIS +	0.4	PT/A	POST	A					
CALLISTO +	3	OZ/A	POST	A	5	0	0	0	0
NIS +	0.4	PT/A	POST	A					
UAN	2	QT/A	POST	A					
PERMIT +	1.33	OZ/A	POST	A	0	0	0	0	0
NIS +	0.4	PT/A	POST	A					
ACCENT +	0.66	OZ/A	POST	A	5	0	0	0	0
COC +	1.5	QT/A	POST	A					
UAN +	2	QT/A	POST	A					
DISTINCT +	2	OZ/A	POST	A	0	5	15	5	5
NIS +	0.4	PT/A	POST	A					
AMS +	2	QT/A	POST	A					
DISTINCT +	4	OZ/A	POST	A	5	0	10	10	10
NIS +	0.4	PT/A	POST	A					
AMS +	2	QT/A	POST	A					
STINGER	1.33	PT/A	POST	A	0	0	0	0	0
BASAGRAN +	2	PT/A	POST	A	0	0	0	0	0
COC +	1.5	PT/A	POST	A					
ATREX +	1.1	LB/A	POST	A	0	5	0	0	5
COC +	2	QT/A	POST	A					
PROWL	3	PT/A	POST	A	0	0	0	0	0
DUAL MAGNUM	1.5	PT/A	POST	A	0	0	5	0	0
OUTLOOK	1	PT/A	POST	A	0	0	0	0	5
CONTROL					0	0	0	0	0

The Ohio State University

SENSITIVITY OF SWEET CORN VARIETIES TO HERBICIDES

Trial ID: SCVSTRIPTRW 2002 Study Dir.: Dr.Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Crop Code					EXTRAT	SENDAY	ICEQUE	SENDAN	SWEETR
Part Rated					INJURY	INJURY	INJURY	INJURY	INJURY
Rating Data Type					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Unit					6/25/2002	6/25/2002	6/25/2002	6/25/2002	6/25/2002
Rating Date									
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	6	7	8	9	10
AIM +	0.33	OZ/A	POST	A	10	5	10	5	5
NIS	0.4	PT/A	POST	A					
OPTION +	1.5	OZ/A	POST	A	0	0	5	0	0
MSO+	1.5	PT/A	POST	A					
UAN	2	QT/A	POST	A					
AEF 130360 02 +	1.75	OZ/A	POST	A	0	0	5	5	0
MSO +	1.5	PT/A	POST	A					
UAN	2	QT/A	POST	A					
CALLISTO +	3	OZ/A	POST	A	0	0	0	0	0
NIS +	0.4	PT/A	POST	A					
CALLISTO +	3	OZ/A	POST	A	0	0	0	0	0
NIS +	0.4	PT/A	POST	A					
UAN	2	QT/A	POST	A					
PERMIT +	1.33	OZ/A	POST	A	0	0	5	0	0
NIS +	0.4	PT/A	POST	A					
ACCENT +	0.66	OZ/A	POST	A	0	0	0	5	0
COC +	1.5	QT/A	POST	A					
UAN +	2	QT/A	POST	A					
DISTINCT +	2	OZ/A	POST	A	5	0	0	5	5
NIS +	0.4	PT/A	POST	A					
AMS +	2	QT/A	POST	A					
DISTINCT +	4	OZ/A	POST	A	5	0	5	5	0
NIS +	0.4	PT/A	POST	A					
AMS +	2	QT/A	POST	A					
STINGER	1.33	PT/A	POST	A	0	0	0	0	0
BASAGRAN +	2	PT/A	POST	A	5	0	0	0	0
COC +	1.5	PT/A	POST	A					
ATREX +	1.1	LB/A	POST	A	0	0	0	0	0
COC +	2	QT/A	POST	A					
PROWL	3	PT/A	POST	A	0	0	0	0	0
DUAL MAGNUM	1.5	PT/A	POST	A	0	0	0	5	5
OUTLOOK	1	PT/A	POST	A	10	0	5	0	0
CONTROL					0	0	0	0	0

The Ohio State University

SENSITIVITY OF SWEET CORN VARIETIES TO HERBICIDES

Trial ID: SCVSTRIPTRW 2002 Study Dir.: Dr.Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Crop Code					KANDYK	IMACUL	SENSOR	SWEETI	MORNST
Part Rated					INJURY	INJURY	INJURY	INJURY	INJURY
Rating Data Type					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Unit					6/25/2002	6/25/2002	6/25/2002	6/25/2002	6/25/2002
Rating Date									
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	11	12	13	14	15
AIM +	0.33	OZ/A	POST	A	5	5	0	10	0
NIS	0.4	PT/A	POST	A					
OPTION +	1.5	OZ/A	POST	A	5	0	5	0	0
MSO+	1.5	PT/A	POST	A					
UAN	2	QT/A	POST	A					
AEF 130360 02 +	1.75	OZ/A	POST	A	10	0	5	5	0
MSO +	1.5	PT/A	POST	A					
UAN	2	QT/A	POST	A					
CALLISTO +	3	OZ/A	POST	A	0	0	15	0	5
NIS +	0.4	PT/A	POST	A					
CALLISTO +	3	OZ/A	POST	A	0	0	0	0	0
NIS +	0.4	PT/A	POST	A					
UAN	2	QT/A	POST	A					
PERMIT +	1.33	OZ/A	POST	A	0	0	0	0	5
NIS +	0.4	PT/A	POST	A					
ACCENT +	0.66	OZ/A	POST	A	0	5	0	10	0
COC +	1.5	QT/A	POST	A					
UAN +	2	QT/A	POST	A					
DISTINCT +	2	OZ/A	POST	A	5	0	0	0	10
NIS +	0.4	PT/A	POST	A					
AMS +	2	QT/A	POST	A					
DISTINCT +	4	OZ/A	POST	A	0	0	0	5	10
NIS +	0.4	PT/A	POST	A					
AMS +	2	QT/A	POST	A					
STINGER	1.33	PT/A	POST	A	5	0	0	5	0
BASAGRAN +	2	PT/A	POST	A	5	5	0	0	5
COC +	1.5	PT/A	POST	A					
ATREX +	1.1	LB/A	POST	A	0	10	0	5	5
COC +	2	QT/A	POST	A					
PROWL	3	PT/A	POST	A	0	5	5	0	0
DUAL MAGNUM	1.5	PT/A	POST	A	5	0	0	0	0
OUTLOOK	1	PT/A	POST	A	5	5	5	5	0
CONTROL					0	0	0	0	0

The Ohio State University

SENSITIVITY OF SWEET CORN VARIETIES TO HERBICIDES

Trial ID: SCVSTRIPTRW 2002 Study Dir.: Dr.Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					TEMPTA	MERLIN	CONFEC	KANKOR	BANDIT
Rating Data Type					INJURY	AV.HEIGHT	AV.HEIGHT	AV.HEIGHT	AV.HEIGHT
Rating Unit					PERCENT	CM.	CM.	CM.	CM.
Rating Date					6/25/2002	7/3/2002	7/3/2002	7/3/2002	7/3/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	16	17	18	19	20
AIM +	0.33	OZ/A	POST	A	5	103.3	94.1	75.7	82.9
NIS	0.4	PT/A	POST	A					
OPTION +	1.5	OZ/A	POST	A	0	97	79.4	84.3	82.1
MSO+	1.5	PT/A	POST	A					
UAN	2	QT/A	POST	A					
AEF 130360 02 +	1.75	OZ/A	POST	A	0	78.3	91.7	80.9	71.4
MSO +	1.5	PT/A	POST	A					
UAN	2	QT/A	POST	A					
CALLISTO +	3	OZ/A	POST	A	0	92.3	86.1	77.7	71.7
NIS +	0.4	PT/A	POST	A					
CALLISTO +	3	OZ/A	POST	A	5	86.5	83.9	85.7	70.4
NIS +	0.4	PT/A	POST	A					
UAN	2	QT/A	POST	A					
PERMIT +	1.33	OZ/A	POST	A	0	81.5	68.2	90.3	74.7
NIS +	0.4	PT/A	POST	A					
ACCENT +	0.66	OZ/A	POST	A	0	94.4	108.5	86.8	79.2
COC +	1.5	QT/A	POST	A					
UAN +	2	QT/A	POST	A					
DISTINCT +	2	OZ/A	POST	A	0	95.5	95.2	87.2	80
NIS +	0.4	PT/A	POST	A					
AMS +	2	QT/A	POST	A					
DISTINCT +	4	OZ/A	POST	A	5	87.5	79.3	88	73.8
NIS +	0.4	PT/A	POST	A					
AMS +	2	QT/A	POST	A					
STINGER	1.33	PT/A	POST	A	5	89.9	94.4	75.2	75.4
BASAGRAN +	2	PT/A	POST	A	0	86.4	70.3	82.3	72
COC +	1.5	PT/A	POST	A					
ATREX +	1.1	LB/A	POST	A	0	59.6	93.2	82.3	84.1
COC +	2	QT/A	POST	A					
PROWL	3	PT/A	POST	A	0	85.5	80.8	81.2	82
DUAL MAGNUM	1.5	PT/A	POST	A	0	77	73.1	72.1	60.9
OUTLOOK	1	PT/A	POST	A	0	89.8	88.4	79.8	81.8
CONTROL					0	85.6	88.1	70.3	74.2

The Ohio State University

SENSITIVITY OF SWEET CORN VARIETIES TO HERBICIDES

Trial ID: SCVSTRIPTRW 2002 Study Dir.: Dr.Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Crop Code					SILVRK	EXTRAT	SENDAY	ICEQUE	SENDAN
Part Rated					AV.HEIGHT	AV.HEIGHT	AV.HEIGHT	AV.HEIGHT	AV.HEIGHT
Rating Data Type					CM.	CM.	CM.	CM.	CM.
Rating Unit					7/3/2002	7/3/2002	7/3/2002	7/3/2002	7/3/2002
Rating Date									
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	21	22	23	24	25
AIM +	0.33	OZ/A	POST	A	74.5	75.1	98.1	87.3	75.1
NIS	0.4	PT/A	POST	A					
OPTION +	1.5	OZ/A	POST	A	78.1	73.7	90.7	78.4	72.6
MSO+	1.5	PT/A	POST	A					
UAN	2	QT/A	POST	A					
AEF 130360 02 +	1.75	OZ/A	POST	A	83	65.2	71.8	76.8	67.8
MSO +	1.5	PT/A	POST	A					
UAN	2	QT/A	POST	A					
CALLISTO +	3	OZ/A	POST	A	55.9	75.7	88.4	89.2	70.8
NIS +	0.4	PT/A	POST	A					
CALLISTO +	3	OZ/A	POST	A	78.1	75.5	81.4	80.1	78.3
NIS +	0.4	PT/A	POST	A					
UAN	2	QT/A	POST	A					
PERMIT +	1.33	OZ/A	POST	A	78.1	74.4	88.2	88.7	70.3
NIS +	0.4	PT/A	POST	A					
ACCENT +	0.66	OZ/A	POST	A	79	70.6	89.2	80	75.3
COC +	1.5	QT/A	POST	A					
UAN +	2	QT/A	POST	A					
DISTINCT +	2	OZ/A	POST	A	68.3	75.4	95.6	84.3	75.1
NIS +	0.4	PT/A	POST	A					
AMS +	2	QT/A	POST	A					
DISTINCT +	4	OZ/A	POST	A	77	59	89.3	95.2	70.6
NIS +	0.4	PT/A	POST	A					
AMS +	2	QT/A	POST	A					
STINGER	1.33	PT/A	POST	A	72.5	71	85.5	84.8	71.4
BASAGRAN +	2	PT/A	POST	A	79.8	71	82.8	86.2	71.6
COC +	1.5	PT/A	POST	A					
ATREX +	1.1	LB/A	POST	A	72.5	76	84.2	83.7	65.5
COC +	2	QT/A	POST	A					
PROWL	3	PT/A	POST	A	71.2	72.6	89.1	88.3	77.2
DUAL MAGNUM	1.5	PT/A	POST	A	86.4	57.8	85.3	80.7	76.5
OUTLOOK	1	PT/A	POST	A	85.6	57.4	81.3	82.8	78.5
CONTROL					74.5	67.9	81.3	86.3	76.8

The Ohio State University

SENSITIVITY OF SWEET CORN VARIETIES TO HERBICIDES

Trial ID: SCVSTRIPTRW 2002 Study Dir.: Dr.Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Crop Code					SWEETR	KANDYK	IMACUL	SENSOR	SWEETI
Part Rated					AV.HEIGHT	AV.HEIGHT	AV.HEIGHT	AV.HEIGHT	AV.HEIGHT
Rating Data Type					CM.	CM.	CM.	CM.	CM.
Rating Unit					7/3/2002	7/3/2002	7/3/2002	7/3/2002	7/3/2002
Rating Date									
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	26	27	28	29	30
AIM +	0.33	OZ/A	POST	A	75.1	76.8	77.5	104.4	104.4
NIS	0.4	PT/A	POST	A					
OPTION +	1.5	OZ/A	POST	A	82.7	66.6	57.9	93.9	93.9
MSO+	1.5	PT/A	POST	A					
UAN	2	QT/A	POST	A					
AEF 130360 02 +	1.75	OZ/A	POST	A	89.8	66.1	70.4	91.7	91.7
MSO +	1.5	PT/A	POST	A					
UAN	2	QT/A	POST	A					
CALLISTO +	3	OZ/A	POST	A	92.1	76.7	76.1	96.4	96.4
NIS +	0.4	PT/A	POST	A					
CALLISTO +	3	OZ/A	POST	A	95.5	69.1	77	94.5	94.5
NIS +	0.4	PT/A	POST	A					
UAN	2	QT/A	POST	A					
PERMIT +	1.33	OZ/A	POST	A	95.7	62.7	73.9	82.5	82.5
NIS +	0.4	PT/A	POST	A					
ACCENT +	0.66	OZ/A	POST	A	99.6	62.4	73.5	79.9	79.9
COC +	1.5	QT/A	POST	A					
UAN +	2	QT/A	POST	A					
DISTINCT +	2	OZ/A	POST	A	92	69.5	67.1	89.8	89.8
NIS +	0.4	PT/A	POST	A					
AMS +	2	QT/A	POST	A					
DISTINCT +	4	OZ/A	POST	A	97.9	64.2	65.3	88.7	88.7
NIS +	0.4	PT/A	POST	A					
AMS +	2	QT/A	POST	A					
STINGER	1.33	PT/A	POST	A	89.7	61.7	66.4	98	98
BASAGRAN +	2	PT/A	POST	A	87.1	66.5	55.6	90.7	90.7
COC +	1.5	PT/A	POST	A					
ATREX +	1.1	LB/A	POST	A	98.6	74.6	72	91.5	91.5
COC +	2	QT/A	POST	A					
PROWL	3	PT/A	POST	A	89.3	78	80.9	92.1	92.1
DUAL MAGNUM	1.5	PT/A	POST	A	82.1	75.4	66.4	91.4	91.4
OUTLOOK	1	PT/A	POST	A	82.1	75.6	71.3	91.4	91.4
CONTROL					90.5	76.3	76.2	86.3	86.3

The Ohio State University

SENSITIVITY OF SWEET CORN VARIETIES TO HERBICIDES

Trial ID: SCVSTRIPTRW 2002 Study Dir.: Dr.Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code							CHEAL	AMBEL	AMBTR
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					MORNST	TEMPTA	WEED	WEED	WEED
Rating Data Type					AV.HEIGHT	AV.HEIGHT	CONTROL	CONTROL	CONTROL
Rating Unit					CM.	CM.	PERCENT	PERCENT	PERCENT
Rating Date					7/3/2002	7/3/2002	8/27/2002	8/27/2002	8/27/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	31	32	33	34	35
AIM +	0.33	OZ/A	POST	A	80	92.9	85	99	99
NIS	0.4	PT/A	POST	A					
OPTION +	1.5	OZ/A	POST	A	77.4	93.9	95	99	99
MSO+	1.5	PT/A	POST	A					
UAN	2	QT/A	POST	A					
AEF 130360 02 +	1.75	OZ/A	POST	A	69.5	102.2	95	99	99
MSO +	1.5	PT/A	POST	A					
UAN	2	QT/A	POST	A					
CALLISTO +	3	OZ/A	POST	A	72.3	104.1	99	99	20
NIS +	0.4	PT/A	POST	A					
CALLISTO +	3	OZ/A	POST	A	67.5	97.2	99	10	10
NIS +	0.4	PT/A	POST	A					
UAN	2	QT/A	POST	A					
PERMIT +	1.33	OZ/A	POST	A	65.7	92	0	99	99
NIS +	0.4	PT/A	POST	A					
ACCENT +	0.66	OZ/A	POST	A	71.8	92.5	85	99	99
COC +	1.5	QT/A	POST	A					
UAN +	2	QT/A	POST	A					
DISTINCT +	2	OZ/A	POST	A	64.7	86	90	95	99
NIS +	0.4	PT/A	POST	A					
AMS +	2	QT/A	POST	A					
DISTINCT +	4	OZ/A	POST	A	74.3	96	99	99	99
NIS +	0.4	PT/A	POST	A					
AMS +	2	QT/A	POST	A					
STINGER	1.33	PT/A	POST	A	65.9	77.6	10	99	99
BASAGRAN +	2	PT/A	POST	A	68	85.4	99	99	99
COC +	1.5	PT/A	POST	A					
ATREX +	1.1	LB/A	POST	A	62	83.9	80	99	99
COC +	2	QT/A	POST	A					
PROWL	3	PT/A	POST	A	64.6	86.1	70	80	70
DUAL MAGNUM	1.5	PT/A	POST	A	61.4	74.2	0	99	99
OUTLOOK	1	PT/A	POST	A	66.9	81.4	10	99	90
CONTROL					68.3	88.4	0	0	0

The Ohio State University

SENSITIVITY OF SWEET CORN VARIETIES TO HERBICIDES

Trial ID: SCVSTRIPTRW 2002 Study Dir.: Dr.Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					AGRASS	CIRAR	MUHSC	OXAST	APPCA
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					WEED	WEED	WEED	WEED	WEED
Rating Data Type					CONTROL	CONTROL	CONTROL	CONTROL	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					8/27/2002	8/27/2002	8/27/2002	8/27/2002	8/27/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	36	37	38	39	40
AIM +	0.33	OZ/A	POST	A	95	10	10	99	10
NIS	0.4	PT/A	POST	A					
OPTION +	1.5	OZ/A	POST	A	90	15	15	99	10
MSO+	1.5	PT/A	POST	A					
UAN	2	QT/A	POST	A					
AEF 130360 02 +	1.75	OZ/A	POST	A	90	20	20	95	25
MSO +	1.5	PT/A	POST	A					
UAN	2	QT/A	POST	A					
CALLISTO +	3	OZ/A	POST	A	85	75	75	85	15
NIS +	0.4	PT/A	POST	A					
CALLISTO +	3	OZ/A	POST	A	85	60	60	99	0
NIS +	0.4	PT/A	POST	A					
UAN	2	QT/A	POST	A					
PERMIT +	1.33	OZ/A	POST	A	90	0	0	99	0
NIS +	0.4	PT/A	POST	A					
ACCENT +	0.66	OZ/A	POST	A	90	5	5	99	0
COC +	1.5	QT/A	POST	A					
UAN +	2	QT/A	POST	A					
DISTINCT +	2	OZ/A	POST	A	85	5	5	10	0
NIS +	0.4	PT/A	POST	A					
AMS +	2	QT/A	POST	A					
DISTINCT +	4	OZ/A	POST	A	80	15	15	99	10
NIS +	0.4	PT/A	POST	A					
AMS +	2	QT/A	POST	A					
STINGER	1.33	PT/A	POST	A	95	10	10	0	15
BASAGRAN +	2	PT/A	POST	A	90	5	5	0	0
COC +	1.5	PT/A	POST	A					
ATREX +	1.1	LB/A	POST	A	90	0	0	99	5
COC +	2	QT/A	POST	A					
PROWL	3	PT/A	POST	A	99	15	15	99	0
DUAL MAGNUM	1.5	PT/A	POST	A	95	0	0	0	0
OUTLOOK	1	PT/A	POST	A	99	10	10	90	0
CONTROL					0	0	0	0	0

The Ohio State University

SENSITIVITY OF SWEET CORN VARIETIES TO HERBICIDES

Trial ID: SCVSTRIPTRW 2002 Study Dir.: Dr.Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code	CYPES
Crop Code	ZEAMS
Part Rated	WEED
Rating Data Type	CONTROL
Rating Unit	PERCENT
Rating Date	8/27/2002

Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	41
AIM +	0.33	OZ/A	POST	A	99
NIS	0.4	PT/A	POST	A	
OPTION +	1.5	OZ/A	POST	A	99
MSO+	1.5	PT/A	POST	A	
UAN	2	QT/A	POST	A	
AEF 130360 02 +	1.75	OZ/A	POST	A	99
MSO +	1.5	PT/A	POST	A	
UAN	2	QT/A	POST	A	
CALLISTO +	3	OZ/A	POST	A	80
NIS +	0.4	PT/A	POST	A	
CALLISTO +	3	OZ/A	POST	A	10
NIS +	0.4	PT/A	POST	A	
UAN	2	QT/A	POST	A	
PERMIT +	1.33	OZ/A	POST	A	0
NIS +	0.4	PT/A	POST	A	
ACCENT +	0.66	OZ/A	POST	A	0
COC +	1.5	QT/A	POST	A	
UAN +	2	QT/A	POST	A	
DISTINCT +	2	OZ/A	POST	A	99
NIS +	0.4	PT/A	POST	A	
AMS +	2	QT/A	POST	A	
DISTINCT +	4	OZ/A	POST	A	90
NIS +	0.4	PT/A	POST	A	
AMS +	2	QT/A	POST	A	
STINGER	1.33	PT/A	POST	A	99
BASAGRAN +	2	PT/A	POST	A	0
COC +	1.5	PT/A	POST	A	
ATREX +	1.1	LB/A	POST	A	80
COC +	2	QT/A	POST	A	
PROWL	3	PT/A	POST	A	99
DUAL MAGNUM	1.5	PT/A	POST	A	99
OUTLOOK	1	PT/A	POST	A	99
CONTROL					0

The Ohio State University

RESPONSE OF FIVE SWEET CORN VARIETIES TO CALLISTO

Trial ID: CALVARTRW 2002 Study Dir.: Dr. Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

COOPERATOR/LANDOWNER

Cooperator: John Elliot,Farm Mgr. Country: USA
Org: OARDC Phone No: 330-264-7008
Address 1: Frye farm, Dairy Lane Rd.
City: Wooster
State/Prov: Ohio
Postal Code: 44691

Conducted Under GLP (Y/N): N Conducted Under GEP (Y/N): N

Objective: To assess "CALLISTO" for phytotoxicity and yield performance applied PRE and POST on key processing and fresh market sweet corn hybrids.

Crop 1: ZEAMS SWEET CORN Variety: VARIOUS
Planting Date: 05/24/02 Planting Method: CONVENTIONAL
Rate: 3 SEEDS/FT. Depth: 1.5 IN
Row Spacing: 30 INCH Seed Bed: CONVENTIONAL
Emergence Date: 06/03/02

SITE AND DESIGN

Plot Width, Unit: 30 FT Plot Length, Unit: 25 FT Reps: 4
Site Type: LEVEL FIELD
Tillage Type: CONVENTIONAL Study Design: SPLIT-PLOT

MAINTENANCE

Field Prep./Maintenance: Plowed and disked field early May. "Dual" was applied PRE at planting on May 24 with five varieties of sweet corn. Applied fertilizer, (800#/A. of 19-19-19) at planting. Irrigated several times throughout summer due to drought conditions. Applied "Warrior" insecticide at recommended rates twice for corn earworm control.

SOIL DESCRIPTION

% Sand: 11 % OM: 3 Texture: SILT LOAM
% Silt: 75 pH: 6.0 Soil Name: WOOSTER SILT LOAM
% Clay: 14 CEC: 13 Fert. Level: MODERATE

APPLICATION DESCRIPTION

	A	B
Application Date:	5/28/2002	6/19/2002
Time of Day:	4-5 PM	11-12 AM
Application Method:	SPRAY	SPRAY
Application Timing:	PREEM	POST
Applic. Placement:	BDCST.	BDCST
Air Temp., Unit:	66 F	80 F
% Relative Humidity:	81	68
Wind Velocity, Unit:	2 MPH	1 MPH
Dew Presence (Y/N):	N	N
% Cloud Cover:	50	20

CROP STAGE AT EACH APPLICATION

	A	B
Crop 1 Code, Stage:	ZEAMS PRI	ZEAMS POST
Stage Scale:	.	VEGETAT.
Height, Unit:	0. .	6 INCH

WEED STAGE AT EACH APPLICATION

	A	B
	PRE	POST
Stage Scale:	.	NONE
Density, Unit:	. .	NONE NONE

APPLICATION EQUIPMENT

	A	B
Appl. Equipment:	CO2 PLOT	CO2 PLOT
Operating Pressure:	35 PSI	35 PSI
Nozzle Type:	FLAT FAN	FLAT FAN
Nozzle Size:	8002VS	8002VS
Nozzle Spacing, Unit:	12 INCH	12 INCH
Nozzles/Row:	10	10
Band Width, Unit:	10 FEET	10 FEET
Boom Height, Unit:	18 INCH	18 INCH
Ground Speed, Unit:	4 MPH	4 MPH
Carrier:	WATER	WATER

The Ohio State University

RESPONSE OF FIVE SWEET CORN VARIETIES TO CALLISTO

Trial ID: CALVARTRW 2002 Study Dir.: Dr. Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Trial Comments

The sweet corn varieties for the trial were: "Kandy King", "Serendipity", "Jubilee", "Silver Queen," and" Kandy Korn." They had different maturation dates, ranging from 73 to 92 days. "Kandy King" was harvested on 8/5/02; (there was extensive ear damage from raccoons), thus yield was partial.

"Serendipity" and "Jubilee" were harvested on 8/12/02; "Silver Queen" and "Kandy Korn" were harvested on 8/20/02. The plots were virtually weed- free.Drought conditions experienced before irrigation was set up may have adverely affected final yield. The ratings used were based on (0-100%): 0=no injury , 100% = high injury. The types of injury ratings included: chlorosis, stunting, twisting, buggy- whipping, and total injury. Average corn heights were taken from 6 plants, measured from the soil line to collar of the most recent fully expanded leaf. Stand counts and yields were based on ten linear feet of row. Yield weights were taken without husks, and were weighed in kilograms. We used the sweet corn yield evaluation parameters. They were:

a) Syngenta Fancy, (6.5" long & <1.0 cm. of blank tip)
b) U.S.Fancy, (6.0" long ; blank tip not an issue)
c) cull, (diseased, poorly-filled ear, or otherwise unmarketable)

The Ohio State University

RESPONSE OF FIVE SWEET CORN VARIETIES TO CALLISTO

Trial ID: CALVARTRW 2002 Study Dir.: Dr. Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					PLANT	PLANT	PLANT	PLANT
Rating Data Type					CHLOROSIS	STUNT	INJURY	BUGGY WHIP
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/21/2002	6/21/2002	6/21/2002	6/21/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	1	2	3	4
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	0 h	0 a	0 h	0 a
AATREX	1.5	PT/A	PREEM	A				
JUBILEE								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	6 d-h	0 a	3 d-h	0 a
AATREX	1.5	PT/A	PREEM	A				
KANDY KING								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	0 h	0 a	0 h	0 a
AATREX	1.5	PT/A	PREEM	A				
SERENDIPITY								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	0 h	0 a	0 h	0 a
AATREX	1.5	PT/A	PREEM	A				
SILVER QUEEN								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	0 h	0 a	0 h	0 a
AATREX	1.5	PT/A	PREEM	A				
KANDY KORN								
A 12909	4.5	PT/A	PREEM	A	1 gh	0 a	1 gh	0 a
JUBILEE								
A 12909	4.5	PT/A	PREEM	A	0 h	0 a	0 h	0 a
KANDY KING								
A 12909	4.5	PT/A	PREEM	A	3 gh	0 a	1 gh	0 a
SERENDIPITY								
A 12909	4.5	PT/A	PREEM	A	0 h	0 a	0 h	0 a
SILVER QUEEN								
A 12909	4.5	PT/A	PREEM	A	0 h	0 a	0 h	0 a
KANDY KORN								
A 12854	5.6	PT/A	PREEM	A	0 h	0 a	0 h	0 a
JUBILEE								
A 12854	5.6	PT/A	PREEM	A	3 gh	0 a	1 gh	0 a
KANDY KING								
A 12854	5.6	PT/A	PREEM	A	1 gh	0 a	1 gh	0 a

SERENDIPITY								
A 12854	5.6	PT/A	PREEM	A	3 gh	0 a	1 gh	0 a
SILVER QUEEN								
A 12854	5.6	PT/A	PREEM	A	0 h	0 a	0 h	0 a
KANDY KORN								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	44 a	0 a	22 a	0 a
AATREX +	1.5	PT/A	PREEM	A				
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B				
COC +	1.6	PT/A	POST6"C	B				
UAN	4	PT/A	POST6"C	B				
JUBILEE								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	13 cd	0 a	6 cd	0 a
AATREX +	1.5	PT/A	PREEM	A				
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B				
COC +	1.6	PT/A	POST6"C	B				
UAN	4	PT/A	POST6"C	B				
KANDY KING								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	9 c-g	0 a	4 c-g	0 a
AATREX +	1.5	PT/A	PREEM	A				
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B				
COC +	1.6	PT/A	POST6"C	B				
UAN	4	PT/A	POST6"C	B				
SERENDIPITY								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	8 d-g	0 a	4 d-g	0 a
AATREX +	1.5	PT/A	PREEM	A				
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B				
COC +	1.6	PT/A	POST6"C	B				
UAN	4	PT/A	POST6"C	B				
SILVER QUEEN								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	21 b	0 a	11 b	0 a
AATREX +	1.5	PT/A	PREEM	A				
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B				
COC +	1.6	PT/A	POST6"C	B				
UAN	4	PT/A	POST6"C	B				
KANDY KORN								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	16 bc	0 a	8 bc	0 a
AATREX +	1.5	PT/A	PREEM	A				
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B				
NIS +	0.25	% V/V	POST6"C	B				
UAN	2.5	% V/V	POST6"C	B				
JUBILEE								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	7 d-h	0 a	3 d-h	0 a
AATREX +	1.5	PT/A	PREEM	A				
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B				
NIS +	0.25	% V/V	POST6"C	B				
UAN	2.5	% V/V	POST6"C	B				
KANDY KING								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	5 d-h	0 a	3 d-h	0 a

AATREX +	1.5	PT/A	PREEM	A				
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B				
NIS +	0.25	% V/V	POST6"C	B				
UAN	2.5	% V/V	POST6"C	B				
SERENDIPITY								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	11 cde	0 a	6 cde	0 a
AATREX +	1.5	PT/A	PREEM	A				
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B				
NIS +	0.25	% V/V	POST6"C	B				
UAN	2.5	% V/V	POST6"C	B				
SILVER QUEEN								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	3 fgh	0 a	2 fgh	0 a
AATREX +	1.5	PT/A	PREEM	A				
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B				
NIS +	0.25	% V/V	POST6"C	B				
UAN	2.5	% V/V	POST6"C	B				
KANDY KORN								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	6 d-h	0 a	3 d-h	0 a
AATREX +	1.5	PT/A	PREEM	A				
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B				
COC	1	% V/V	POST6"C	B				
JUBILEE								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	0 h	0 a	1 gh	0 a
AATREX +	1.5	PT/A	PREEM	A				
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B				
COC	1	% V/V	POST6"C	B				
KANDY KING								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	4 e-h	0 a	2 e-h	0 a
AATREX +	1.5	PT/A	PREEM	A				
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B				
COC	1	% V/V	POST6"C	B				
SERENDIPITY								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	1 gh	0 a	1 gh	0 a
AATREX +	1.5	PT/A	PREEM	A				
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B				
COC	1	% V/V	POST6"C	B				
SILVER QUEEN								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	2 gh	0 a	1 gh	0 a
AATREX +	1.5	PT/A	PREEM	A				
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B				
COC	1	% V/V	POST6"C	B				
KANDY KORN								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	11 c-f	0 a	5 c-f	0 a
AATREX +	1.5	PT/A	PREEM	A				
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B				
AATREX +	0.5	PT/A	POST6"C	B				
COC	1.6	PT/A	POST6"C	B				
JUBILEE								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	4 e-h	0 a	2 e-h	0 a

AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
AATREX +	0.5 PT/A	POST6"C	B				
COC	1.6 PT/A	POST6"C	B				
KANDY KING							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	9 c-g	0 a	4 c-g	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
AATREX +	0.5 PT/A	POST6"C	B				
COC	1.6 PT/A	POST6"C	B				
SERENDIPITY							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	5 d-h	0 a	3 d-h	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
AATREX +	0.5 PT/A	POST6"C	B				
COC	1.6 PT/A	POST6"C	B				
SILVER QUEEN							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	7 d-h	0 a	3 d-h	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
AATREX +	0.5 PT/A	POST6"C	B				
COC	1.6 PT/A	POST6"C	B				
KANDY KORN							
LSD (P=.05)				7.8	0	3.9	0
CV				97.38	0	97.57	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

RESPONSE OF FIVE SWEET CORN VARIETIES TO CALLISTO

Trial ID: CALVARTRW 2002 Study Dir.: Dr. Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code							
Crop Code					ZEAMS	ZEAMS	ZEAMS
Part Rated					PLANT	PLANT	PLANT
Rating Data Type					TWIST	CHLOROSIS	STUNT
Rating Unit					PERCENT	PERCENT	PERCENT
Rating Date					6/21/2002	6/28/2002	6/28/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	5	6	7
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	0 b	0 h	0 a
AATREX	1.5	PT/A	PREEM	A			
JUBILEE							
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	0 b	0 h	0 a
AATREX	1.5	PT/A	PREEM	A			
KANDY KING							
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	1 a	0 h	0 a
AATREX	1.5	PT/A	PREEM	A			
SERENDIPITY							
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	0 b	0 h	0 a
AATREX	1.5	PT/A	PREEM	A			
SILVER QUEEN							
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	0 b	0 h	0 a
AATREX	1.5	PT/A	PREEM	A			
KANDY KORN							
A 12909	4.5	PT/A	PREEM	A	0 b	0 h	0 a
JUBILEE							
A 12909	4.5	PT/A	PREEM	A	0 b	0 h	0 a
KANDY KING							
A 12909	4.5	PT/A	PREEM	A	0 b	0 h	0 a
SERENDIPITY							
A 12909	4.5	PT/A	PREEM	A	0 b	0 h	0 a
SILVER QUEEN							
A 12909	4.5	PT/A	PREEM	A	0 b	0 h	0 a
KANDY KORN							
A 12854	5.6	PT/A	PREEM	A	0 b	0 h	0 a
JUBILEE							
A 12854	5.6	PT/A	PREEM	A	0 b	0 h	0 a
KANDY KING							
A 12854	5.6	PT/A	PREEM	A	1 a	0 h	0 a

SERENDIPITY						
A 12854	5.6 PT/A	PREEM	A	0 b	0 h	0 a
SILVER QUEEN						
A 12854	5.6 PT/A	PREEM	A	0 b	0 h	0 a
KANDY KORN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 b	23 a	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC +	1.6 PT/A	POST6"C	B			
UAN	4 PT/A	POST6"C	B			
JUBILEE						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 b	14 b	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC +	1.6 PT/A	POST6"C	B			
UAN	4 PT/A	POST6"C	B			
KANDY KING						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 b	5 efg	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC +	1.6 PT/A	POST6"C	B			
UAN	4 PT/A	POST6"C	B			
SERENDIPITY						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 b	11 bc	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC +	1.6 PT/A	POST6"C	B			
UAN	4 PT/A	POST6"C	B			
SILVER QUEEN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 b	4 e-h	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC +	1.6 PT/A	POST6"C	B			
UAN	4 PT/A	POST6"C	B			
KANDY KORN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 b	19 a	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
NIS +	0.25 % V/V	POST6"C	B			
UAN	2.5 % V/V	POST6"C	B			
JUBILEE						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 b	5 efg	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
NIS +	0.25 % V/V	POST6"C	B			
UAN	2.5 % V/V	POST6"C	B			
KANDY KING						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 b	0 h	0 a

AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
NIS +	0.25 % V/V	POST6"C	B			
UAN	2.5 % V/V	POST6"C	B			
SERENDIPITY						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 b	11 bc	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
NIS +	0.25 % V/V	POST6"C	B			
UAN	2.5 % V/V	POST6"C	B			
SILVER QUEEN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 b	1 gh	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
NIS +	0.25 % V/V	POST6"C	B			
UAN	2.5 % V/V	POST6"C	B			
KANDY KORN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 b	6 def	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC	1 % V/V	POST6"C	B			
JUBILEE						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 b	1 gh	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC	1 % V/V	POST6"C	B			
KANDY KING						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 b	0 h	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC	1 % V/V	POST6"C	B			
SERENDIPITY						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 b	5 efg	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC	1 % V/V	POST6"C	B			
SILVER QUEEN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 b	1 gh	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC	1 % V/V	POST6"C	B			
KANDY KORN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 b	10 bcd	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
AATREX +	0.5 PT/A	POST6"C	B			
COC	1.6 PT/A	POST6"C	B			
JUBILEE						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 b	3 fgh	0 a

AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
AATREX +	0.5 PT/A	POST6"C	B			
COC	1.6 PT/A	POST6"C	B			
KANDY KING						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 b	3 fgh	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
AATREX +	0.5 PT/A	POST6"C	B			
COC	1.6 PT/A	POST6"C	B			
SERENDIPITY						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 b	8 cde	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
AATREX +	0.5 PT/A	POST6"C	B			
COC	1.6 PT/A	POST6"C	B			
SILVER QUEEN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 b	8 cde	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
AATREX +	0.5 PT/A	POST6"C	B			
COC	1.6 PT/A	POST6"C	B			
KANDY KORN						
LSD (P=.05)				0.8	3.9	0
CV				824.26	70.73	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

RESPONSE OF FIVE SWEET CORN VARIETIES TO CALLISTO

Trial ID: CALVARTRW 2002 Study Dir.: Dr. Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code							
Crop Code					ZEAMS	ZEAMS	ZEAMS
Part Rated					PLANT	PLANT	PLANT
Rating Data Type					INJURY	BUGGY WHIP	TWIST
Rating Unit					PERCENT	PERCENT	PERCENT
Rating Date					6/28/2002	6/28/2002	6/28/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	8	9	10
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	0 e	0 a	0 a
AATREX	1.5	PT/A	PREEM	A			
JUBILEE							
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	0 e	0 a	0 a
AATREX	1.5	PT/A	PREEM	A			
KANDY KING							
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	0 e	0 a	0 a
AATREX	1.5	PT/A	PREEM	A			
SERENDIPITY							
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	0 e	0 a	0 a
AATREX	1.5	PT/A	PREEM	A			
SILVER QUEEN							
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	0 e	0 a	0 a
AATREX	1.5	PT/A	PREEM	A			
KANDY KORN							
A 12909	4.5	PT/A	PREEM	A	0 e	0 a	0 a
JUBILEE							
A 12909	4.5	PT/A	PREEM	A	0 e	0 a	0 a
KANDY KING							
A 12909	4.5	PT/A	PREEM	A	0 e	0 a	0 a
SERENDIPITY							
A 12909	4.5	PT/A	PREEM	A	0 e	0 a	0 a
SILVER QUEEN							
A 12909	4.5	PT/A	PREEM	A	0 e	0 a	0 a
KANDY KORN							
A 12854	5.6	PT/A	PREEM	A	0 e	0 a	0 a
JUBILEE							
A 12854	5.6	PT/A	PREEM	A	0 e	0 a	0 a
KANDY KING							
A 12854	5.6	PT/A	PREEM	A	0 e	0 a	0 a

SERENDIPITY						
A 12854	5.6 PT/A	PREEM	A	0 e	0 a	0 a
SILVER QUEEN						
A 12854	5.6 PT/A	PREEM	A	0 e	0 a	0 a
KANDY KORN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	16 a	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC +	1.6 PT/A	POST6"C	B			
UAN	4 PT/A	POST6"C	B			
JUBILEE						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	9 b	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC +	1.6 PT/A	POST6"C	B			
UAN	4 PT/A	POST6"C	B			
KANDY KING						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 e	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC +	1.6 PT/A	POST6"C	B			
UAN	4 PT/A	POST6"C	B			
SERENDIPITY						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	6 bc	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC +	1.6 PT/A	POST6"C	B			
UAN	4 PT/A	POST6"C	B			
SILVER QUEEN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 e	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC +	1.6 PT/A	POST6"C	B			
UAN	4 PT/A	POST6"C	B			
KANDY KORN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	14 a	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
NIS +	0.25 % V/V	POST6"C	B			
UAN	2.5 % V/V	POST6"C	B			
JUBILEE						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	1 e	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
NIS +	0.25 % V/V	POST6"C	B			
UAN	2.5 % V/V	POST6"C	B			
KANDY KING						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 e	0 a	0 a

AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
NIS +	0.25 % V/V	POST6"C	B			
UAN	2.5 % V/V	POST6"C	B			
SERENDIPITY						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	6 bc	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
NIS +	0.25 % V/V	POST6"C	B			
UAN	2.5 % V/V	POST6"C	B			
SILVER QUEEN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 e	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
NIS +	0.25 % V/V	POST6"C	B			
UAN	2.5 % V/V	POST6"C	B			
KANDY KORN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	1 e	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC	1 % V/V	POST6"C	B			
JUBILEE						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 e	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC	1 % V/V	POST6"C	B			
KANDY KING						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 e	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC	1 % V/V	POST6"C	B			
SERENDIPITY						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	3 de	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC	1 % V/V	POST6"C	B			
SILVER QUEEN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 e	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC	1 % V/V	POST6"C	B			
KANDY KORN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	5 cd	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
AATREX +	0.5 PT/A	POST6"C	B			
COC	1.6 PT/A	POST6"C	B			
JUBILEE						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 e	0 a	0 a

AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
AATREX +	0.5 PT/A	POST6"C	B			
COC	1.6 PT/A	POST6"C	B			
KANDY KING						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 e	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
AATREX +	0.5 PT/A	POST6"C	B			
COC	1.6 PT/A	POST6"C	B			
SERENDIPITY						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	3 de	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
AATREX +	0.5 PT/A	POST6"C	B			
COC	1.6 PT/A	POST6"C	B			
SILVER QUEEN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	3 de	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
AATREX +	0.5 PT/A	POST6"C	B			
COC	1.6 PT/A	POST6"C	B			
KANDY KORN						
LSD (P=.05)				3.1	0	0
CV				115.96	0	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

RESPONSE OF FIVE SWEET CORN VARIETIES TO CALLISTO

Trial ID: CALVARTRW 2002 Study Dir.: Dr. Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code Crop Code Part Rated Rating Data Type Rating Unit Rating Date					ZEAMS PLANT AV.HEIGHT (CM.) 7/1/2002	ZEAMS PLANT CHLOROSIS PERCENT 7/1/2002	ZEAMS PLANT STUNT PERCENT 7/1/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	11	12	13
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	74.8 abc	0 h	0 a
AATREX	1.5	PT/A	PREEM	A			
JUBILEE							
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	61.8 ghi	0 h	0 a
AATREX	1.5	PT/A	PREEM	A			
KANDY KING							
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	60.8 ghi	0 h	0 a
AATREX	1.5	PT/A	PREEM	A			
SERENDIPITY							
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	73.6 a-e	0 h	0 a
AATREX	1.5	PT/A	PREEM	A			
SILVER QUEEN							
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	68.3 b-g	0 h	0 a
AATREX	1.5	PT/A	PREEM	A			
KANDY KORN							
A 12909	4.5	PT/A	PREEM	A	74.8 abc	0 h	0 a
JUBILEE							
A 12909	4.5	PT/A	PREEM	A	65.4 d-i	0 h	0 a
KANDY KING							
A 12909	4.5	PT/A	PREEM	A	59.2 hi	0 h	0 a
SERENDIPITY							
A 12909	4.5	PT/A	PREEM	A	77.2 a	0 h	0 a
SILVER QUEEN							
A 12909	4.5	PT/A	PREEM	A	71.6 a-f	0 h	0 a
KANDY KORN							
A 12854	5.6	PT/A	PREEM	A	71.7 a-f	0 h	0 a
JUBILEE							
A 12854	5.6	PT/A	PREEM	A	61 ghi	0 h	0 a
KANDY KING							
A 12854	5.6	PT/A	PREEM	A	59.3 hi	0 h	0 a

SERENDIPITY						
A 12854	5.6 PT/A	PREEM	A	73.1 a-e	0 h	0 a
SILVER QUEEN						
A 12854	5.6 PT/A	PREEM	A	74.3 abc	0 h	0 a
KANDY KORN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	74.3 abc	23 a	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC +	1.6 PT/A	POST6"C	B			
UAN	4 PT/A	POST6"C	B			
JUBILEE						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	63.9 f-i	14 b	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC +	1.6 PT/A	POST6"C	B			
UAN	4 PT/A	POST6"C	B			
KANDY KING						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	58.2 hi	5 efg	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC +	1.6 PT/A	POST6"C	B			
UAN	4 PT/A	POST6"C	B			
SERENDIPITY						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	70.3 a-f	11 bc	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC +	1.6 PT/A	POST6"C	B			
UAN	4 PT/A	POST6"C	B			
SILVER QUEEN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	71.1 a-f	4 e-h	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC +	1.6 PT/A	POST6"C	B			
UAN	4 PT/A	POST6"C	B			
KANDY KORN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	75.7 ab	19 a	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
NIS +	0.25 % V/V	POST6"C	B			
UAN	2.5 % V/V	POST6"C	B			
JUBILEE						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	59.2 hi	5 efg	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
NIS +	0.25 % V/V	POST6"C	B			
UAN	2.5 % V/V	POST6"C	B			
KANDY KING						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	58.2 i	0 h	0 a

AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
NIS +	0.25 % V/V	POST6"C	B			
UAN	2.5 % V/V	POST6"C	B			
SERENDIPITY						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	71.4 a-f	11 bc	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
NIS +	0.25 % V/V	POST6"C	B			
UAN	2.5 % V/V	POST6"C	B			
SILVER QUEEN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	73.8 a-d	1 gh	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
NIS +	0.25 % V/V	POST6"C	B			
UAN	2.5 % V/V	POST6"C	B			
KANDY KORN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	71.3 a-f	6 def	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC	1 % V/V	POST6"C	B			
JUBILEE						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	64.2 f-i	1 gh	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC	1 % V/V	POST6"C	B			
KANDY KING						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	58.4 hi	0 h	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC	1 % V/V	POST6"C	B			
SERENDIPITY						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	78.3 a	5 efg	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC	1 % V/V	POST6"C	B			
SILVER QUEEN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	76.2 ab	1 gh	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC	1 % V/V	POST6"C	B			
KANDY KORN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	77.4 a	10 bcd	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
AATREX +	0.5 PT/A	POST6"C	B			
COC	1.6 PT/A	POST6"C	B			
JUBILEE						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	66.7 c-h	3 fgh	0 a

AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
AATREX +	0.5 PT/A	POST6"C	B			
COC	1.6 PT/A	POST6"C	B			
KANDY KING						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	59.2 hi	3 fgh	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
AATREX +	0.5 PT/A	POST6"C	B			
COC	1.6 PT/A	POST6"C	B			
SERENDIPITY						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	75.7 ab	8 cde	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
AATREX +	0.5 PT/A	POST6"C	B			
COC	1.6 PT/A	POST6"C	B			
SILVER QUEEN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	65.3 e-i	8 cde	0 a
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
AATREX +	0.5 PT/A	POST6"C	B			
COC	1.6 PT/A	POST6"C	B			
KANDY KORN						
LSD (P=.05)				8.49	3.9	0
CV				8.86	70.73	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

RESPONSE OF FIVE SWEET CORN VARIETIES TO CALLISTO

Trial ID: CALVARTRW 2002 Study Dir.: Dr. Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					PLANT	PLANT	PLANT	PLANT
Rating Data Type					INJURY	BUGGY WHIP	TWIST	CHLOROSIS
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/1/2002	7/1/2002	7/1/2002	7/15/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	14	15	16	17
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	0 a	0 a	0 a	0 a
AATREX	1.5	PT/A	PREEM	A				
JUBILEE								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	0 a	0 a	0 a	0 a
AATREX	1.5	PT/A	PREEM	A				
KANDY KING								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	0 a	0 a	0 a	0 a
AATREX	1.5	PT/A	PREEM	A				
SERENDIPITY								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	0 a	0 a	0 a	0 a
AATREX	1.5	PT/A	PREEM	A				
SILVER QUEEN								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	0 a	0 a	0 a	0 a
AATREX	1.5	PT/A	PREEM	A				
KANDY KORN								
A 12909	4.5	PT/A	PREEM	A	0 a	0 a	0 a	0 a
JUBILEE								
A 12909	4.5	PT/A	PREEM	A	0 a	0 a	0 a	0 a
KANDY KING								
A 12909	4.5	PT/A	PREEM	A	0 a	0 a	0 a	0 a
SERENDIPITY								
A 12909	4.5	PT/A	PREEM	A	0 a	0 a	0 a	0 a
SILVER QUEEN								
A 12909	4.5	PT/A	PREEM	A	0 a	0 a	0 a	0 a
KANDY KORN								
A 12854	5.6	PT/A	PREEM	A	0 a	0 a	0 a	0 a
JUBILEE								
A 12854	5.6	PT/A	PREEM	A	0 a	0 a	0 a	0 a
KANDY KING								
A 12854	5.6	PT/A	PREEM	A	0 a	0 a	0 a	0 a

SERENDIPITY							
A 12854	5.6 PT/A	PREEM	A	0 a	0 a	0 a	0 a
SILVER QUEEN							
A 12854	5.6 PT/A	PREEM	A	0 a	0 a	0 a	0 a
KANDY KORN							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 a	0 a	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
COC +	1.6 PT/A	POST6"C	B				
UAN	4 PT/A	POST6"C	B				
JUBILEE							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 a	0 a	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
COC +	1.6 PT/A	POST6"C	B				
UAN	4 PT/A	POST6"C	B				
KANDY KING							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 a	0 a	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
COC +	1.6 PT/A	POST6"C	B				
UAN	4 PT/A	POST6"C	B				
SERENDIPITY							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 a	0 a	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
COC +	1.6 PT/A	POST6"C	B				
UAN	4 PT/A	POST6"C	B				
SILVER QUEEN							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 a	0 a	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
COC +	1.6 PT/A	POST6"C	B				
UAN	4 PT/A	POST6"C	B				
KANDY KORN							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 a	0 a	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
NIS +	0.25 % V/V	POST6"C	B				
UAN	2.5 % V/V	POST6"C	B				
JUBILEE							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 a	0 a	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
NIS +	0.25 % V/V	POST6"C	B				
UAN	2.5 % V/V	POST6"C	B				
KANDY KING							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 a	0 a	0 a	0 a

AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
NIS +	0.25 % V/V	POST6"C	B				
UAN	2.5 % V/V	POST6"C	B				
SERENDIPITY							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 a	0 a	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
NIS +	0.25 % V/V	POST6"C	B				
UAN	2.5 % V/V	POST6"C	B				
SILVER QUEEN							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 a	0 a	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
NIS +	0.25 % V/V	POST6"C	B				
UAN	2.5 % V/V	POST6"C	B				
KANDY KORN							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 a	0 a	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
COC	1 % V/V	POST6"C	B				
JUBILEE							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 a	0 a	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
COC	1 % V/V	POST6"C	B				
KANDY KING							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 a	0 a	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
COC	1 % V/V	POST6"C	B				
SERENDIPITY							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 a	0 a	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
COC	1 % V/V	POST6"C	B				
SILVER QUEEN							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 a	0 a	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
COC	1 % V/V	POST6"C	B				
KANDY KORN							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 a	0 a	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
AATREX +	0.5 PT/A	POST6"C	B				
COC	1.6 PT/A	POST6"C	B				
JUBILEE							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 a	0 a	0 a	0 a

AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
AATREX +	0.5 PT/A	POST6"C	B				
COC	1.6 PT/A	POST6"C	B				
KANDY KING							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 a	0 a	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
AATREX +	0.5 PT/A	POST6"C	B				
COC	1.6 PT/A	POST6"C	B				
SERENDIPITY							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 a	0 a	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
AATREX +	0.5 PT/A	POST6"C	B				
COC	1.6 PT/A	POST6"C	B				
SILVER QUEEN							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 a	0 a	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
AATREX +	0.5 PT/A	POST6"C	B				
COC	1.6 PT/A	POST6"C	B				
KANDY KORN							
LSD (P=.05)				0	0	0	0
CV				0	0	0	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

RESPONSE OF FIVE SWEET CORN VARIETIES TO CALLISTO

Trial ID: CALVARTRW 2002 Study Dir.: Dr. Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					PLANT	PLANT	PLANT	PLANT
Rating Data Type					STUNT	INJURY	BUGGY WHIP	TWIST
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/15/2002	7/15/2002	7/15/2002	7/15/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	18	19	20	21
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	0 b	0 b	0 a	0 a
AATREX	1.5	PT/A	PREEM	A				
JUBILEE								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	0 b	0 b	0 a	0 a
AATREX	1.5	PT/A	PREEM	A				
KANDY KING								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	0 b	0 b	0 a	0 a
AATREX	1.5	PT/A	PREEM	A				
SERENDIPITY								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	0 b	0 b	0 a	0 a
AATREX	1.5	PT/A	PREEM	A				
SILVER QUEEN								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	0 b	0 b	0 a	0 a
AATREX	1.5	PT/A	PREEM	A				
KANDY KORN								
A 12909	4.5	PT/A	PREEM	A	3 ab	3 ab	0 a	0 a
JUBILEE								
A 12909	4.5	PT/A	PREEM	A	0 b	0 b	0 a	0 a
KANDY KING								
A 12909	4.5	PT/A	PREEM	A	0 b	0 b	0 a	0 a
SERENDIPITY								
A 12909	4.5	PT/A	PREEM	A	0 b	0 b	0 a	0 a
SILVER QUEEN								
A 12909	4.5	PT/A	PREEM	A	0 b	0 b	0 a	0 a
KANDY KORN								
A 12854	5.6	PT/A	PREEM	A	9 a	9 a	0 a	0 a
JUBILEE								
A 12854	5.6	PT/A	PREEM	A	4 ab	4 ab	0 a	0 a
KANDY KING								
A 12854	5.6	PT/A	PREEM	A	6 ab	1 ab	0 a	0 a

SERENDIPITY							
A 12854	5.6 PT/A	PREEM	A	6 ab	8 ab	0 a	0 a
SILVER QUEEN							
A 12854	5.6 PT/A	PREEM	A	4 ab	5 ab	0 a	0 a
KANDY KORN							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	6 ab	6 ab	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
COC +	1.6 PT/A	POST6"C	B				
UAN	4 PT/A	POST6"C	B				
JUBILEE							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	5 ab	5 ab	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
COC +	1.6 PT/A	POST6"C	B				
UAN	4 PT/A	POST6"C	B				
KANDY KING							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	6 ab	6 ab	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
COC +	1.6 PT/A	POST6"C	B				
UAN	4 PT/A	POST6"C	B				
SERENDIPITY							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	1 ab	1 ab	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
COC +	1.6 PT/A	POST6"C	B				
UAN	4 PT/A	POST6"C	B				
SILVER QUEEN							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 b	0 b	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
COC +	1.6 PT/A	POST6"C	B				
UAN	4 PT/A	POST6"C	B				
KANDY KORN							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	4 ab	4 ab	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
NIS +	0.25 % V/V	POST6"C	B				
UAN	2.5 % V/V	POST6"C	B				
JUBILEE							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	5 ab	5 ab	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
NIS +	0.25 % V/V	POST6"C	B				
UAN	2.5 % V/V	POST6"C	B				
KANDY KING							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	6 ab	6 ab	0 a	0 a

AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
NIS +	0.25 % V/V	POST6"C	B				
UAN	2.5 % V/V	POST6"C	B				
SERENDIPITY							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	8 ab	8 ab	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
NIS +	0.25 % V/V	POST6"C	B				
UAN	2.5 % V/V	POST6"C	B				
SILVER QUEEN							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 b	0 b	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
NIS +	0.25 % V/V	POST6"C	B				
UAN	2.5 % V/V	POST6"C	B				
KANDY KORN							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	8 ab	8 ab	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
COC	1 % V/V	POST6"C	B				
JUBILEE							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	6 ab	6 ab	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
COC	1 % V/V	POST6"C	B				
KANDY KING							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	5 ab	5 ab	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
COC	1 % V/V	POST6"C	B				
SERENDIPITY							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	5 ab	5 ab	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
COC	1 % V/V	POST6"C	B				
SILVER QUEEN							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	0 b	0 b	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
COC	1 % V/V	POST6"C	B				
KANDY KORN							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	5 ab	5 ab	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
AATREX +	0.5 PT/A	POST6"C	B				
COC	1.6 PT/A	POST6"C	B				
JUBILEE							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	4 ab	4 ab	0 a	0 a

AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
AATREX +	0.5 PT/A	POST6"C	B				
COC	1.6 PT/A	POST6"C	B				
KANDY KING							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	5 ab	5 ab	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
AATREX +	0.5 PT/A	POST6"C	B				
COC	1.6 PT/A	POST6"C	B				
SERENDIPITY							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	8 ab	8 ab	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
AATREX +	0.5 PT/A	POST6"C	B				
COC	1.6 PT/A	POST6"C	B				
SILVER QUEEN							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	3 ab	3 ab	0 a	0 a
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
AATREX +	0.5 PT/A	POST6"C	B				
COC	1.6 PT/A	POST6"C	B				
KANDY KORN							
LSD (P=.05)				8.2	8.1	0	0
CV				170.29	172.58	0	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

RESPONSE OF FIVE SWEET CORN VARIETIES TO CALLISTO

Trial ID: CALVARTRW 2002 Study Dir.: Dr. Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code							
Crop Code					ZEAMS	ZEAMS	ZEAMS
Part Rated					YIELD	PLANTS	YIELD
Rating Data Type					STAND COUNT	SYNG.FANCY	SYNG.FANCY
Rating Unit					PER 10"	PER 10'	LBS./A.
Rating Date					8/20/2002	8/20/2002	8/20/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	22	23	25
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	11 c-g	4 a-f	542 a-g
AATREX	1.5	PT/A	PREEM	A			
JUBILEE							
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	12 c-f	5 a-d	
AATREX	1.5	PT/A	PREEM	A			
KANDY KING							
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	10 d-g	6 abc	914 abc
AATREX	1.5	PT/A	PREEM	A			
SERENDIPITY							
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	10 d-g	3 b-g	503 a-g
AATREX	1.5	PT/A	PREEM	A			
SILVER QUEEN							
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	10 d-g	2 efg	353 d-g
AATREX	1.5	PT/A	PREEM	A			
KANDY KORN							
A 12909	4.5	PT/A	PREEM	A	15 ab	5 a-e	805 a-e
JUBILEE							
A 12909	4.5	PT/A	PREEM	A	10 d-g	4 a-f	
KANDY KING							
A 12909	4.5	PT/A	PREEM	A	12 b-f	6 a	995 a
SERENDIPITY							
A 12909	4.5	PT/A	PREEM	A	10 c-g	4 a-f	705 a-f
SILVER QUEEN							
A 12909	4.5	PT/A	PREEM	A	10 d-g	3 b-g	665 a-f
KANDY KORN							
A 12854	5.6	PT/A	PREEM	A	13 a-e	2 efg	267 efg
JUBILEE							
A 12854	5.6	PT/A	PREEM	A	12 b-f	6 abc	
KANDY KING							
A 12854	5.6	PT/A	PREEM	A	13 abc	3 b-g	435 b-g

SERENDIPITY						
A 12854	5.6 PT/A	PREEM	A	10 efg	4 a-f	666 a-f
SILVER QUEEN						
A 12854	5.6 PT/A	PREEM	A	11 c-g	1 fg	254 fg
KANDY KORN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	13 a-e	4 a-f	593 a-g
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC +	1.6 PT/A	POST6"C	B			
UAN	4 PT/A	POST6"C	B			
JUBILEE						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	11 c-g	4 a-f	
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC +	1.6 PT/A	POST6"C	B			
UAN	4 PT/A	POST6"C	B			
KANDY KING						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	11 c-g	4 a-f	666 a-f
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC +	1.6 PT/A	POST6"C	B			
UAN	4 PT/A	POST6"C	B			
SERENDIPITY						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	9 g	3 c-g	463 a-g
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC +	1.6 PT/A	POST6"C	B			
UAN	4 PT/A	POST6"C	B			
SILVER QUEEN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	11 c-g	2 d-g	424 c-g
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC +	1.6 PT/A	POST6"C	B			
UAN	4 PT/A	POST6"C	B			
KANDY KORN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	16 a	6 abc	922 abc
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
NIS +	0.25 % V/V	POST6"C	B			
UAN	2.5 % V/V	POST6"C	B			
JUBILEE						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	11 c-g	6 ab	
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
NIS +	0.25 % V/V	POST6"C	B			
UAN	2.5 % V/V	POST6"C	B			
KANDY KING						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	9 fg	4 a-f	557 a-g

AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
NIS +	0.25 % V/V	POST6"C	B			
UAN	2.5 % V/V	POST6"C	B			
SERENDIPITY						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	12 b-f	3 c-g	490 a-g
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
NIS +	0.25 % V/V	POST6"C	B			
UAN	2.5 % V/V	POST6"C	B			
SILVER QUEEN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	10 d-g	2 efg	411 c-g
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
NIS +	0.25 % V/V	POST6"C	B			
UAN	2.5 % V/V	POST6"C	B			
KANDY KORN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	13 a-d	5 a-e	753 a-f
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC	1 % V/V	POST6"C	B			
JUBILEE						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	11 c-g	5 a-d	
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC	1 % V/V	POST6"C	B			
KANDY KING						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	11 c-g	4 a-f	981 ab
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC	1 % V/V	POST6"C	B			
SERENDIPITY						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	9 g	4 a-f	728 a-f
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC	1 % V/V	POST6"C	B			
SILVER QUEEN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	11 c-g	3 b-g	569 a-g
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
COC	1 % V/V	POST6"C	B			
KANDY KORN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	12 b-f	5 a-d	816 a-d
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
AATREX +	0.5 PT/A	POST6"C	B			
COC	1.6 PT/A	POST6"C	B			
JUBILEE						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	13 a-d	6 abc	

AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
AATREX +	0.5 PT/A	POST6"C	B			
COC	1.6 PT/A	POST6"C	B			
KANDY KING						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	10 c-g	3 a-g	526 a-g
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
AATREX +	0.5 PT/A	POST6"C	B			
COC	1.6 PT/A	POST6"C	B			
SERENDIPITY						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	11 c-g	2 d-g	355 d-g
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
AATREX +	0.5 PT/A	POST6"C	B			
COC	1.6 PT/A	POST6"C	B			
SILVER QUEEN						
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	11 c-g	0 g	54 g
AATREX +	1.5 PT/A	PREEM	A			
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B			
AATREX +	0.5 PT/A	POST6"C	B			
COC	1.6 PT/A	POST6"C	B			
KANDY KORN						
LSD (P=.05)				3.1	3.2	546.7
CV				19.81	60.75	65.95

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

RESPONSE OF FIVE SWEET CORN VARIETIES TO CALLISTO

Trial ID: CALVARTRW 2002 Study Dir.: Dr. Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code Crop Code Part Rated Rating Data Type Rating Unit Rating Date					ZEAMS EARS U.S.FANCY PER 10' 8/20/2002	ZEAMS YIELD U.S.FANCY LBS./A. 8/20/2002	ZEAMS EARS CULLS PER 10' 8/20/2002	ZEAMS YIELD CULLS LBS./A. 8/20/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	26	28	29	31
DUAL II MAGNUM + AATREX JUBILEE	1.67 1.5	PT/A PT/A	PREEM PREEM	A A	4 d-h	640 e-h	7 ab	2996 abc
DUAL II MAGNUM + AATREX KANDY KING	1.67 1.5	PT/A PT/A	PREEM PREEM	A A	3 gh		5 abc	
DUAL II MAGNUM + AATREX SERENDIPITY	1.67 1.5	PT/A PT/A	PREEM PREEM	A A	4 e-h	459 ghi	3 bc	1210 cd
DUAL II MAGNUM + AATREX SILVER QUEEN	1.67 1.5	PT/A PT/A	PREEM PREEM	A A	6 a-f	897 c-h	4 abc	2228 a-d
DUAL II MAGNUM + AATREX KANDY KORN	1.67 1.5	PT/A PT/A	PREEM PREEM	A A	7 a-e	1229 a-d	6 abc	2881 abc
A 12909 JUBILEE	4.5	PT/A	PREEM	A	5 c-h	766 d-h	7 abc	3861 a
A 12909 KANDY KING	4.5	PT/A	PREEM	A	2 h		6 abc	
A 12909 SERENDIPITY	4.5	PT/A	PREEM	A	5 c-h	584 ghi	6 abc	2555 abc
A 12909 SILVER QUEEN	4.5	PT/A	PREEM	A	8 abc	1200 a-e	3 bc	1777 a-d
A 12909 KANDY KORN	4.5	PT/A	PREEM	A	7 a-f	1223 a-e	4 abc	2795 abc
A 12854 JUBILEE	5.6	PT/A	PREEM	A	3 fgh	505 ghi	8 a	3765 a
A 12854 KANDY KING	5.6	PT/A	PREEM	A	3 fgh	0 i	3 bc	0 d
A 12854	5.6	PT/A	PREEM	A	5 c-h	570 ghi	8 a	3668 a

SERENDIPITY											
A 12854	5.6	PT/A	PREEM	A	4	d-h	578	ghi	5	abc	2430 abc
SILVER QUEEN											
A 12854	5.6	PT/A	PREEM	A	9	ab	1364	abc	5	abc	2737 abc
KANDY KORN											
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	4	e-h	503	ghi	7	ab	3496 ab
AATREX +	1.5	PT/A	PREEM	A							
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B							
COC +	1.6	PT/A	POST6"C	B							
UAN	4	PT/A	POST6"C	B							
JUBILEE											
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	4	d-h			3	bc	
AATREX +	1.5	PT/A	PREEM	A							
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B							
COC +	1.6	PT/A	POST6"C	B							
UAN	4	PT/A	POST6"C	B							
KANDY KING											
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	3	gh	365	hi	4	abc	2209 a-d
AATREX +	1.5	PT/A	PREEM	A							
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B							
COC +	1.6	PT/A	POST6"C	B							
UAN	4	PT/A	POST6"C	B							
SERENDIPITY											
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	4	e-h	1026	b-g	5	abc	2785 abc
AATREX +	1.5	PT/A	PREEM	A							
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B							
COC +	1.6	PT/A	POST6"C	B							
UAN	4	PT/A	POST6"C	B							
SILVER QUEEN											
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	7	a-d	1364	abc	4	abc	3256 abc
AATREX +	1.5	PT/A	PREEM	A							
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B							
COC +	1.6	PT/A	POST6"C	B							
UAN	4	PT/A	POST6"C	B							
KANDY KORN											
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	5	c-h	595	fgh	5	abc	2535 abc
AATREX +	1.5	PT/A	PREEM	A							
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B							
NIS +	0.25	% V/V	POST6"C	B							
UAN	2.5	% V/V	POST6"C	B							
JUBILEE											
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	3	gh			3	bc	0 d
AATREX +	1.5	PT/A	PREEM	A							
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B							
NIS +	0.25	% V/V	POST6"C	B							
UAN	2.5	% V/V	POST6"C	B							
KANDY KING											
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	4	d-h	505	ghi	6	abc	3092 abc

AATREX +	1.5	PT/A	PREEM	A				
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B				
NIS +	0.25	% V/V	POST6"C	B				
UAN	2.5	% V/V	POST6"C	B				
SERENDIPITY								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	5 c-h	701 d-h	6 abc	2871 abc
AATREX +	1.5	PT/A	PREEM	A				
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B				
NIS +	0.25	% V/V	POST6"C	B				
UAN	2.5	% V/V	POST6"C	B				
SILVER QUEEN								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	9 ab	1715 a	5 abc	3083 abc
AATREX +	1.5	PT/A	PREEM	A				
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B				
NIS +	0.25	% V/V	POST6"C	B				
UAN	2.5	% V/V	POST6"C	B				
KANDY KORN								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	5 c-h	714 d-h	5 abc	2382 abc
AATREX +	1.5	PT/A	PREEM	A				
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B				
COC	1	% V/V	POST6"C	B				
JUBILEE								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	3 gh	0 i	4 abc	
AATREX +	1.5	PT/A	PREEM	A				
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B				
COC	1	% V/V	POST6"C	B				
KANDY KING								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	4 d-h	449 ghi	5 abc	2036 a-d
AATREX +	1.5	PT/A	PREEM	A				
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B				
COC	1	% V/V	POST6"C	B				
SERENDIPITY								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	6 b-g	786 c-h	4 abc	2343 abc
AATREX +	1.5	PT/A	PREEM	A				
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B				
COC	1	% V/V	POST6"C	B				
SILVER QUEEN								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	6 a-f	1179 a-f	5 abc	2487 abc
AATREX +	1.5	PT/A	PREEM	A				
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B				
COC	1	% V/V	POST6"C	B				
KANDY KORN								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	5 c-h	729 d-h	3 c	1316 bcd
AATREX +	1.5	PT/A	PREEM	A				
CALLISTO (WF 2795) +	3	FL OZ/A	POST6"C	B				
AATREX +	0.5	PT/A	POST6"C	B				
COC	1.6	PT/A	POST6"C	B				
JUBILEE								
DUAL II MAGNUM +	1.67	PT/A	PREEM	A	5 c-h		3 bc	

AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
AATREX +	0.5 PT/A	POST6"C	B				
COC	1.6 PT/A	POST6"C	B				
KANDY KING							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	3 gh	351 hi	6 abc	2497 abc
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
AATREX +	0.5 PT/A	POST6"C	B				
COC	1.6 PT/A	POST6"C	B				
SERENDIPITY							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	7 a-e	1024 b-g	6 abc	2996 abc
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
AATREX +	0.5 PT/A	POST6"C	B				
COC	1.6 PT/A	POST6"C	B				
SILVER QUEEN							
DUAL II MAGNUM +	1.67 PT/A	PREEM	A	10 a	1606 ab	5 abc	2468 abc
AATREX +	1.5 PT/A	PREEM	A				
CALLISTO (WF 2795) +	3 FL OZ/A	POST6"C	B				
AATREX +	0.5 PT/A	POST6"C	B				
COC	1.6 PT/A	POST6"C	B				
KANDY KORN							
LSD (P=.05)				3.5	586.9	4.1	2247.3
CV				50.09	52.69	60.19	63.77

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

PERFORMANCE OF PROWL H2O ON SWEET CORN

Trial ID: PROWLSCW 2002 Study Dir.: Dr.Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

COOPERATOR/LANDOWNER

Cooperator: Paul McMillen, Farm Mgr. Country: USA
Org: OARDC/East Badger Farm Phone No: 330-264-7008
Address 1: Ely Road
City: Wooster
State/Prov: Ohio
Postal Code: 44691

Conducted Under GLP (Y/N): N Conducted Under GEP (Y/N): N

Objective: To evaluate " Prowl H2O" in combination with other herbicides for weed control in sweet corn.

CROP AND WEED DESCRIPTION

Weed	Code	Common Name	Scientific Name
1	CHEAL	common lambsquarter	Chenopodium album L.
2	AMBEL	common ragweed	Ambrosia artemisiifolia L.
3	AGRASS	foxtail and crabgrass species	Setaria spp., Digitaria spp.
4	CIRAR	Canada thistle	Cirsium arvense (L.) Scop.
5	POLPY	Pennsylvania smartweed	Polygonum pensylvanicum L.
6	AMBTR	giant ragweed	Ambrosia trifida L.
7	ABUTH	velvetleaf	Abutilon theophrasti Medicus

Crop 1: ZEAMS SWEET CORN Variety: ROGERS GSS 966 ATTRIBUTE
Planting Date: 05/10/02 Planting Method: CONVENTIONAL
Rate: 3 SEEDS/FOOT Depth: 1.5 IN
Row Spacing: 30 INCH Seed Bed: CONVENTIONAL
Soil Temperature: 50 F Soil Moisture: MEDIUM Emergence Date: 05/24/02

SITE AND DESIGN

Plot Width, Unit: 10 FT Plot Length, Unit: 40 FT Reps: 4
Study Design: RANDOMIZED COMPLETE BLOCK

MAINTENANCE

Field Prep./Maintenance: Field was plowed/disked in late April. Fertilizer was applied, at 800#/A.,(19-19-19) on May 10,2002.

SOIL DESCRIPTION

% Sand: 11 % OM: 3 Texture: SILT LOAM
% Silt: 75 pH: 6.0 Soil Name: WOOSTER SILT LOAM
% Clay: 14 CEC: 13 Fert. Level: MODERATE

APPLICATION DESCRIPTION

	A	B	C	D
Application Date:	5/10/2002	5/23/2002	6/10/2002	7/4/2002
Time of Day:	8-9 AM	9-10 AM	11-12 AM	10-11 AM
Application Method:	SPRAY	SPRAY	SPRAY	SPRAY
Application Timing:	PRE	SPIKE	MIDPOST	LATE POST
Applic. Placement:	BDCST.	BDCST.	BDCST.	BDCST.
Air Temp., Unit:	50 F	60 F	75 F	87 F
% Relative Humidity:	55	59	76	66
Wind Velocity, Unit:	6 MPH	3 MPH	1 MPH	1 MPH
Dew Presence (Y/N):	N	N	N	N
Soil Moisture:	MOIST	MOIST	DRY	DRY
% Cloud Cover:	0	0	20	20

CROP STAGE AT EACH APPLICATION

	A	B	C	D
Crop 1 Code, Stage:	ZEAMS PRE	ZEAMS SPIKE	ZEAMS MIDPOST	ZEAMS
Stage Scale:	NONE	VEGETAT.	VEGETAT.	
Height, Unit:	0 INCH	1.5 INCH	6 INCH	

WEED STAGE AT EACH APPLICATION

	A	B	C	D
Weed 1 Code, Stage:	CHEAL PRE	CHEAL SPIKE	CHEAL MID-POST	CHEAL
Stage Scale:	.	.	2-6 LF.	
Density, Unit:	. .	. .	LOW	
Weed 2 Code, Stage:	AMBEL PRE	AMBEL SPIKE	AMBEL MID-POST	AMBEL
Stage Scale:	.	.	2-6 LF.	
Density, Unit:	. .	. .	MED.	
Weed 3 Code, Stage:	AGRAS PRE	AGRAS SPIKE	AGRAS MID-POST	AGRAS
Stage Scale:	.	.	2-6 LF.	
Density, Unit:	. .	. .	HIGH	
Weed 4 Code, Stage:	CIRAR PRE	CIRAR SPIKE	CIRAR MID-POST	CIRAR
Stage Scale:	.	.	2-6 LF.	
Density, Unit:	. .	. .	MED.	
Weed 5 Code, Stage:	POLPY PRE	POLPY SPIKE	POLPY MID-POST	POLPY
Stage Scale:	.	.	2-6 LF.	
Density, Unit:	. .	. .	LOW	
Weed 6 Code, Stage:	AMBTR PRE	AMBTR SPIKE	AMBTR MID-POST	AMBTR
Stage Scale:	.	.	2-6 LF.	
Density, Unit:	. .	. .	LOW	
Weed 7 Code, Stage:	ABUTH PRE	ABUTH SPIKE	ABUTH MID-POST	ABUTH
Stage Scale:	.	.	2-6 LF.	
Density, Unit:	. .	. .	LOW	

APPLICATION EQUIPMENT

	A	B	C	D
Appl. Equipment:	CO2 PLOT	CO2 PLOT	CO2 PLOT	CO2 PLOT
Operating Pressure:	35	35	35	35
Nozzle Type:	FLAT FAN	FLAT FAN	FLAT FAN	FLAT FAN
Nozzle Size:	8002 VS	8002 VS	8002 VS	8002 VS
Nozzle Spacing, Unit:	12 IN.	12 IN.	12 IN.	12 IN.
Nozzles/Row:	10	10	10	10
Band Width, Unit:	10 FT.	10 FT.	10 FT.	10 FT.
Boom Height, Unit:	18 IN.	18 IN.	18 IN.	18 IN.
Ground Speed, Unit:	4 MPH	4 MPH	4 MPH	4 MPH

The Ohio State University

PERFORMANCE OF PROWL H2O ON SWEET CORN

Trial ID: PROWLSCW 2002 Study Dir.: Dr.Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Trial Comments

The study site was heavily infested with Canada thistle. It was controlled in treatments 6 & 7; treatments 2-5 required a late application of Distinct @ 4 oz./A. + NIS@ 4 pt./A., for thistle control on 7/4/02. Weed counts were the sum of three (50 x 50 cm .) quadrats per plot . Yield data and stand counts were taken from a 10' length of row in plot center, weighed in kg. Weed control ratings are from 0-100 percent ; (0= no control , & 100 = complete control). We had a severe drought this summer which impacted crop growth & yield. We also had raccoon damage throughout the plot. Corn was weighed with husks on.

The Ohio State University

PERFORMANCE OF PROWL H2O ON SWEET CORN

Trial ID: PROWLSCW 2002 Study Dir.: Dr.Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code						CHEAL	AMBEL	AMBTR	A.GRASS
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					PLANT	WEED	WEED	WEED	WEED
Rating Data Type					INJURY	CONTROL	CONTROL	CONTROL	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/6/2002	6/6/2002	6/6/2002	6/6/2002	6/6/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	1	2	3	4	5
WEEDY CHECK					0 b	0 b	0 b	0 b	0 b
GUARDSMAN MAX	4	PT/A	PREEM	A	5 a	99 a	99 a	79 a	99 a
GUARDSMAN MAX	4.6	PT/A	PREEM	A	1 b	99 a	99 a	94 a	99 a
BAS 45521H +	3.1	PT/A	SPIKE	B	1 b	93 a	99 a	99 a	99 a
ATRAZINE	1	QT/A	SPIKE	B					
PROWL +	3.6	PT/A	SPIKE	B	0 b	99 a	79 a	79 a	99 a
ATRAZINE	1	QT/A	SPIKE	B					
OUTLOOK	16	OZ/A	PREEM	A	1 b	99 a	70 a	76 a	74 a
BAS 45521H +	2.6	PT/A	MIDPOST	C					
DISTINCT +	4	OZ/A	MIDPOST	C					
NIS	0.4	PT/A	MIDPOST	C					
OUTLOOK	16	OZ/A	PREEM	A	1 b	97 a	72 a	65 a	99 a
PROWL +	3.6	PT/A	SPIKE	B					
DISTINCT +	4	OZ/A	MIDPOST	C					
NIS	0.4	PT/A	MIDPOST	C					
LSD (P=.05)					3.6	7.3	43.1	42.6	27.8
CV					167.91	5.89	39.24	40.78	23.01

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

PERFORMANCE OF PROWL H2O ON SWEET CORN

Trial ID: PROWLSCW 2002 Study Dir.: Dr.Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	6	7	8	9	10
Weed Code					CIRAR	POLPY	ABUTH	CHEAL	AMBEL
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					WEED	WEED	WEED	WEED	WEED
Rating Data Type					CONTROL	CONTROL	CONTROL	COUNT	COUNT
Rating Unit					PERCENT	PERCENT	PERCENT	TOTAL	TOTAL
Rating Date					6/6/2002	6/6/2002	6/6/2002	6/12/2002	6/12/2002
WEEDY CHECK					0 b	0 b	0 b	1 a	16 a
GUARDSMAN MAX	4	PT/A	PREEM	A	13 ab	99 a	99 a	0 b	0 b
GUARDSMAN MAX	4.6	PT/A	PREEM	A	37 a	99 a	99 a	0 b	0 b
BAS 45521H +	3.1	PT/A	SPIKE	B	29 ab	99 a	99 a	0 b	0 b
ATRAZINE	1	QT/A	SPIKE	B					
PROWL +	3.6	PT/A	SPIKE	B	25 ab	99 a	99 a	0 b	0 b
ATRAZINE	1	QT/A	SPIKE	B					
OUTLOOK	16	OZ/A	PREEM	A	0 b	99 a	99 a	0 b	0 b
BAS 45521H +	2.6	PT/A	MIDPOST	C					
DISTINCT +	4	OZ/A	MIDPOST	C					
NIS	0.4	PT/A	MIDPOST	C					
OUTLOOK	16	OZ/A	PREEM	A	10 ab	99 a	99 a	0 b	1 ab
PROWL +	3.6	PT/A	SPIKE	B					
DISTINCT +	4	OZ/A	MIDPOST	C					
NIS	0.4	PT/A	MIDPOST	C					
LSD (P=.05)					29.1	0	0	0.3	15.6
CV					120.82	0	0	305.51	425.27

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

PERFORMANCE OF PROWL H2O ON SWEET CORN

Trial ID: PROWLSCW 2002 Study Dir.: Dr.Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	11	12	13	14	15
Weed Code					AMBTR	A.GRASS	CIRAR	POLPY	ABUTH
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					WEED	WEED	WEED	WEED	WEED
Rating Data Type					COUNT	COUNT	COUNT	COUNT	COUNT
Rating Unit					TOTAL	TOTAL	TOTAL	TOTAL	TOTAL
Rating Date					6/12/2002	6/12/2002	6/12/2002	6/12/2002	6/12/2002
WEEDY CHECK					1 a	140 a	13 a	1 a	0 a
GUARDSMAN MAX	4	PT/A	PREEM	A	0 a	0 b	7 a	0 b	0 a
GUARDSMAN MAX	4.6	PT/A	PREEM	A	1 a	0 b	10 a	0 b	0 a
BAS 45521H +	3.1	PT/A	SPIKE	B	0 a	0 b	10 a	0 b	0 a
ATRAZINE	1	QT/A	SPIKE	B					
PROWL +	3.6	PT/A	SPIKE	B	0 a	0 b	17 a	0 b	0 a
ATRAZINE	1	QT/A	SPIKE	B					
OUTLOOK	16	OZ/A	PREEM	A	0 a	1 b	15 a	0 b	0 a
BAS 45521H +	2.6	PT/A	MIDPOST	C					
DISTINCT +	4	OZ/A	MIDPOST	C					
NIS	0.4	PT/A	MIDPOST	C					
OUTLOOK	16	OZ/A	PREEM	A	0 a	0 b	13 a	0 b	0 a
PROWL +	3.6	PT/A	SPIKE	B					
DISTINCT +	4	OZ/A	MIDPOST	C					
NIS	0.4	PT/A	MIDPOST	C					
LSD (P=.05)					0.8	45.2	12.5	0.5	0
CV					240.63	151.62	69.99	202.65	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

PERFORMANCE OF PROWL H2O ON SWEET CORN

Trial ID: PROWLSCW 2002 Study Dir.: Dr.Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code						CHEAL	AMBEL	AMBTR	A.GRASS
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					PLANT	WEED	WEED	WEED	WEED
Rating Data Type					INJURY	CONTROL	CONTROL	CONTROL	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/27/2002	6/27/2002	6/27/2002	6/27/2002	6/27/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	16	17	18	19	20
WEEDY CHECK					0 b	25 b	25 b	25 b	25 b
GUARDSMAN MAX	4	PT/A	PREEM	A	0 b	74 a	74 a	96 a	98 a
GUARDSMAN MAX	4.6	PT/A	PREEM	A	4 a	99 a	99 a	90 a	99 a
BAS 45521H +	3.1	PT/A	SPIKE	B	0 b	99 a	99 a	99 a	93 a
ATRAZINE	1	QT/A	SPIKE	B					
PROWL +	3.6	PT/A	SPIKE	B	3 ab	99 a	99 a	92 a	99 a
ATRAZINE	1	QT/A	SPIKE	B					
OUTLOOK	16	OZ/A	PREEM	A	0 b	99 a	99 a	99 a	99 a
BAS 45521H +	2.6	PT/A	MIDPOST	C					
DISTINCT +	4	OZ/A	MIDPOST	C					
NIS	0.4	PT/A	MIDPOST	C					
OUTLOOK	16	OZ/A	PREEM	A	1 ab	99 a	99 a	99 a	98 a
PROWL +	3.6	PT/A	SPIKE	B					
DISTINCT +	4	OZ/A	MIDPOST	C					
NIS	0.4	PT/A	MIDPOST	C					
LSD (P=.05)					2.7	38.2	38.2	28.2	27.9
CV					168.87	30.3	30.3	22.23	21.51

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

PERFORMANCE OF PROWL H2O ON SWEET CORN

Trial ID: PROWLSCW 2002 Study Dir.: Dr.Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					CIRAR	POLPY	ABUTH	CHEAL	AMBEL
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					WEED	WEED	WEED	WEED	WEED
Rating Data Type					CONTROL	CONTROL	CONTROL	COUNT	COUNT
Rating Unit					PERCENT	PERCENT	PERCENT	TOTAL	TOTAL
Rating Date					6/27/2002	6/27/2002	6/27/2002	6/27/2002	6/27/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	21	22	23	24	25
WEEDY CHECK					0 c	25 b	25 b	2 a	12 a
GUARDSMAN MAX	4	PT/A	PREEM	A	56 ab	99 a	99 a	0 b	0 b
GUARDSMAN MAX	4.6	PT/A	PREEM	A	53 ab	99 a	99 a	0 b	0 b
BAS 45521H +	3.1	PT/A	SPIKE	B	62 ab	99 a	99 a	0 b	0 b
ATRAZINE	1	QT/A	SPIKE	B					
PROWL +	3.6	PT/A	SPIKE	B	35 bc	99 a	99 a	0 b	0 b
ATRAZINE	1	QT/A	SPIKE	B					
OUTLOOK	16	OZ/A	PREEM	A	84 a	99 a	99 a	0 b	0 b
BAS 45521H +	2.6	PT/A	MIDPOST	C					
DISTINCT +	4	OZ/A	MIDPOST	C					
NIS	0.4	PT/A	MIDPOST	C					
OUTLOOK	16	OZ/A	PREEM	A	69 ab	99 a	99 a	0 b	0 b
PROWL +	3.6	PT/A	SPIKE	B					
DISTINCT +	4	OZ/A	MIDPOST	C					
NIS	0.4	PT/A	MIDPOST	C					
LSD (P=.05)					42.2	27.8	27.8	1.4	9.7
CV					55.28	21.17	21.17	247.37	372.58

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

PERFORMANCE OF PROWL H2O ON SWEET CORN

Trial ID: PROWLSCW 2002 Study Dir.: Dr.Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					AMBTR	A.GRASS	CIRAR	POLPY	ABUTH
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					WEED	WEED	WEED	WEED	WEED
Rating Data Type					COUNT	COUNT	COUNT	COUNT	COUNT
Rating Unit					TOTAL	TOTAL	TOTAL	TOTAL	TOTAL
Rating Date					6/27/2002	6/27/2002	6/27/2002	6/27/2002	6/27/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	26	27	28	29	30
WEEDY CHECK					0 a	88 a	10 ab	2 a	0 a
GUARDSMAN MAX	4	PT/A	PREEM	A	0 a	1 b	10 ab	0 a	0 a
GUARDSMAN MAX	4.6	PT/A	PREEM	A	1 a	0 b	7 ab	0 a	0 a
BAS 45521H +	3.1	PT/A	SPIKE	B	0 a	1 b	6 b	0 a	0 a
ATRAZINE	1	QT/A	SPIKE	B					
PROWL +	3.6	PT/A	SPIKE	B	0 a	1 b	17 a	0 a	0 a
ATRAZINE	1	QT/A	SPIKE	B					
OUTLOOK	16	OZ/A	PREEM	A	0 a	0 b	3 b	0 a	0 a
BAS 45521H +	2.6	PT/A	MIDPOST	C					
DISTINCT +	4	OZ/A	MIDPOST	C					
NIS	0.4	PT/A	MIDPOST	C					
OUTLOOK	16	OZ/A	PREEM	A	0 a	0 b	4 b	0 a	0 a
PROWL +	3.6	PT/A	SPIKE	B					
DISTINCT +	4	OZ/A	MIDPOST	C					
NIS	0.4	PT/A	MIDPOST	C					
LSD (P=.05)					0.6	19.1	9.8	2.5	0.4
CV					367.17	99.55	81.3	529.15	341.57

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

PERFORMANCE OF PROWL H2O ON SWEET CORN

Trial ID: PROWLSCW 2002 Study Dir.: Dr.Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code							CHEAL	AMBEL	AMBTR
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					CORN	PLANT	WEED	WEED	WEED
Rating Data Type					AV.HEIGHT	INJURY	CONTROL	CONTROL	CONTROL
Rating Unit					INCHES	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/1/2002	7/16/2002	7/16/2002	7/16/2002	7/16/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	31	32	33	34	35
WEEDY CHECK					26.3 c	0 a	0 b	0 b	0 b
GUARDSMAN MAX	4	PT/A	PREEM	A	28.3 bc	0 a	99 a	99 a	99 a
GUARDSMAN MAX	4.6	PT/A	PREEM	A	29.5 b	0 a	99 a	99 a	99 a
BAS 45521H +	3.1	PT/A	SPIKE	B	32.3 a	0 a	99 a	99 a	99 a
ATRAZINE	1	QT/A	SPIKE	B					
PROWL +	3.6	PT/A	SPIKE	B	30 ab	0 a	99 a	99 a	99 a
ATRAZINE	1	QT/A	SPIKE	B					
OUTLOOK	16	OZ/A	PREEM	A	30.1 ab	3 a	99 a	99 a	99 a
BAS 45521H +	2.6	PT/A	MIDPOST	C					
DISTINCT +	4	OZ/A	MIDPOST	C					
NIS	0.4	PT/A	MIDPOST	C					
OUTLOOK	16	OZ/A	PREEM	A	28.6 bc	1 a	99 a	99 a	99 a
PROWL +	3.6	PT/A	SPIKE	B					
DISTINCT +	4	OZ/A	MIDPOST	C					
NIS	0.4	PT/A	MIDPOST	C					
LSD (P=.05)					2.71	2.9	0	0	0
CV					6.22	367.17	0	0	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

PERFORMANCE OF PROWL H2O ON SWEET CORN

Trial ID: PROWLSCW 2002 Study Dir.: Dr.Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					A.GRASS	CIRAR	POLPY	ABUTH	CHEAL
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					WEED	WEED	WEED	WEED	WEED
Rating Data Type					CONTROL	CONTROL	CONTROL	CONTROL	COUNT
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	TOTAL
Rating Date					7/16/2002	7/16/2002	7/16/2002	7/16/2002	8/1/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	36	37	38	39	40
WEEDY CHECK					0 c	0 b	0 b	0 b	1 a
GUARDSMAN MAX	4	PT/A	PREEM	A	98 ab	81 a	99 a	99 a	0 b
GUARDSMAN MAX	4.6	PT/A	PREEM	A	96 ab	78 a	99 a	99 a	0 b
BAS 45521H +	3.1	PT/A	SPIKE	B	97 ab	75 a	99 a	99 a	0 b
ATRAZINE	1	QT/A	SPIKE	B					
PROWL +	3.6	PT/A	SPIKE	B	97 ab	75 a	99 a	99 a	0 b
ATRAZINE	1	QT/A	SPIKE	B					
OUTLOOK	16	OZ/A	PREEM	A	93 b	75 a	99 a	99 a	0 b
BAS 45521H +	2.6	PT/A	MIDPOST	C					
DISTINCT +	4	OZ/A	MIDPOST	C					
NIS	0.4	PT/A	MIDPOST	C					
OUTLOOK	16	OZ/A	PREEM	A	99 a	80 a	99 a	99 a	0 b
PROWL +	3.6	PT/A	SPIKE	B					
DISTINCT +	4	OZ/A	MIDPOST	C					
NIS	0.4	PT/A	MIDPOST	C					
LSD (P=.05)					5.5	11.3	0	0	0.7
CV					4.43	11.45	0	0	266.33

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

PERFORMANCE OF PROWL H2O ON SWEET CORN

Trial ID: PROWLSCW 2002 Study Dir.: Dr.Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					AMBEL	AMBTR	A.GRASS	CIRAR	POLPY
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					WEED	WEED	WEED	WEED	WEED
Rating Data Type					COUNT	COUNT	COUNT	COUNT	COUNT
Rating Unit					TOTAL	TOTAL	TOTAL	TOTAL	TOTAL
Rating Date					8/1/2002	8/1/2002	8/1/2002	8/1/2002	8/1/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	41	42	43	44	45
WEEDY CHECK					9 a	0 a	79 a	3 ab	0 a
GUARDSMAN MAX	4	PT/A	PREEM	A	0 b	0 a	1 b	4 ab	0 a
GUARDSMAN MAX	4.6	PT/A	PREEM	A	0 b	0 a	0 b	1 b	0 a
BAS 45521H +	3.1	PT/A	SPIKE	B	0 b	0 a	2 b	2 ab	0 a
ATRAZINE	1	QT/A	SPIKE	B					
PROWL +	3.6	PT/A	SPIKE	B	0 b	0 a	1 b	1 b	0 a
ATRAZINE	1	QT/A	SPIKE	B					
OUTLOOK	16	OZ/A	PREEM	A	0 b	0 a	0 b	8 a	0 a
BAS 45521H +	2.6	PT/A	MIDPOST	C					
DISTINCT +	4	OZ/A	MIDPOST	C					
NIS	0.4	PT/A	MIDPOST	C					
OUTLOOK	16	OZ/A	PREEM	A	0 b	0 a	0 b	6 ab	0 a
PROWL +	3.6	PT/A	SPIKE	B					
DISTINCT +	4	OZ/A	MIDPOST	C					
NIS	0.4	PT/A	MIDPOST	C					
LSD (P=.05)					8.9	0.3	51	6.8	0
CV					453.68	529.15	291	128.29	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

PERFORMANCE OF PROWL H2O ON SWEET CORN

Trial ID: PROWLSCW 2002 Study Dir.: Dr.Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					ABUTH		CHEAL	AMBEL	AMBTR
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					WEED	PLANT	WEED	WEED	WEED
Rating Data Type					COUNT	INJURY	CONTROL	CONTROL	CONTROL
Rating Unit					TOTAL	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					8/1/2002	8/2/2002	8/2/2002	8/2/2002	8/2/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	46	47	48	49	50
WEEDY CHECK					0 a	0 a	0 b	0 b	0 b
GUARDSMAN MAX	4	PT/A	PREEM	A	0 a	0 a	99 a	99 a	99 a
GUARDSMAN MAX	4.6	PT/A	PREEM	A	0 a	0 a	99 a	99 a	99 a
BAS 45521H +	3.1	PT/A	SPIKE	B	0 a	0 a	99 a	99 a	99 a
ATRAZINE	1	QT/A	SPIKE	B					
PROWL +	3.6	PT/A	SPIKE	B	0 a	0 a	99 a	99 a	99 a
ATRAZINE	1	QT/A	SPIKE	B					
OUTLOOK	16	OZ/A	PREEM	A	0 a	0 a	99 a	99 a	99 a
BAS 45521H +	2.6	PT/A	MIDPOST	C					
DISTINCT +	4	OZ/A	MIDPOST	C					
NIS	0.4	PT/A	MIDPOST	C					
OUTLOOK	16	OZ/A	PREEM	A	0 a	0 a	99 a	99 a	99 a
PROWL +	3.6	PT/A	SPIKE	B					
DISTINCT +	4	OZ/A	MIDPOST	C					
NIS	0.4	PT/A	MIDPOST	C					
LSD (P=.05)					0.3	0	0	0	0
CV					529.15	0	0	0	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

PERFORMANCE OF PROWL H2O ON SWEET CORN

Trial ID: PROWLSCW 2002 Study Dir.: Dr.Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					A.GRASS	CIRAR	POLPY	ABUTH	
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					WEED	WEED	WEED	WEED	YIELD
Rating Data Type					CONTROL	CONTROL	CONTROL	CONTROL	STAND COUNT
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PER 10'
Rating Date					8/2/2002	8/2/2002	8/2/2002	8/2/2002	8/24/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	51	52	53	54	55
WEEDY CHECK					0 c	0 c	0 b	0 b	0 b
GUARDSMAN MAX	4	PT/A	PREEM	A	98 ab	94 a	99 a	99 a	15 a
GUARDSMAN MAX	4.6	PT/A	PREEM	A	96 ab	95 a	99 a	99 a	12 a
BAS 45521H +	3.1	PT/A	SPIKE	B	97 ab	95 a	99 a	99 a	13 a
ATRAZINE	1	QT/A	SPIKE	B					
PROWL +	3.6	PT/A	SPIKE	B	97 ab	95 a	99 a	99 a	14 a
ATRAZINE	1	QT/A	SPIKE	B					
OUTLOOK	16	OZ/A	PREEM	A	93 b	75 b	99 a	99 a	12 a
BAS 45521H +	2.6	PT/A	MIDPOST	C					
DISTINCT +	4	OZ/A	MIDPOST	C					
NIS	0.4	PT/A	MIDPOST	C					
OUTLOOK	16	OZ/A	PREEM	A	99 a	86 a	99 a	99 a	13 a
PROWL +	3.6	PT/A	SPIKE	B					
DISTINCT +	4	OZ/A	MIDPOST	C					
NIS	0.4	PT/A	MIDPOST	C					
LSD (P=.05)					5.5	10.7	0	0	3
CV					4.43	9.31	0	0	17.88

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

PERFORMANCE OF PROWL H2O ON SWEET CORN

Trial ID: PROWLSCW 2002 Study Dir.: Dr.Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	56	57	58	60
Weed Code								
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					YIELD	YIELD	EARS	YIELD
Rating Data Type					PL.W/CORN	PL/W/O CORN	MKTBL.NO.	MKTBL.WT.
Rating Unit					PER 10'	PER 10'	PER 10'	LBS./A.
Rating Date					8/24/2002	8/24/2002	8/24/2002	8/24/2002
WEEDY CHECK					0 b	0 c	0 b	0 b
GUARDSMAN MAX	4	PT/A	PREEM	A	12 a	3 ab	2 ab	1748 ab
GUARDSMAN MAX	4.6	PT/A	PREEM	A	10 a	2 bc	2 a	1709 ab
BAS 45521H +	3.1	PT/A	SPIKE	B	10 a	3 ab	2 a	1844 a
ATRAZINE	1	QT/A	SPIKE	B				
PROWL +	3.6	PT/A	SPIKE	B	9 a	5 a	2 ab	1527 ab
ATRAZINE	1	QT/A	SPIKE	B				
OUTLOOK	16	OZ/A	PREEM	A	11 a	1 bc	2 ab	1373 ab
BAS 45521H +	2.6	PT/A	MIDPOST	C				
DISTINCT +	4	OZ/A	MIDPOST	C				
NIS	0.4	PT/A	MIDPOST	C				
OUTLOOK	16	OZ/A	PREEM	A	12 a	2 bc	2 a	2094 a
PROWL +	3.6	PT/A	SPIKE	B				
DISTINCT +	4	OZ/A	MIDPOST	C				
NIS	0.4	PT/A	MIDPOST	C				
LSD (P=.05)					3.2	2.5	2	1805.6
CV					23.54	75.73	80.17	82.64

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

PERFORMANCE OF PROWL H2O ON SWEET CORN

Trial ID: PROWLSCW 2002 Study Dir.: Dr.Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code						
Crop Code					ZEAMS	ZEAMS
Part Rated					EARS	YIELD
Rating Data Type					CULL NO.	WT.CULL
Rating Unit					PER 10'	LBS./A.
Rating Date					8/24/2002	8/24/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	61	63
WEEDY CHECK					0 b	0 c
GUARDSMAN MAX	4	PT/A	PREEM	A	10 a	3577 ab
GUARDSMAN MAX	4.6	PT/A	PREEM	A	8 a	2769 ab
BAS 45521H +	3.1	PT/A	SPIKE	B	8 a	2601 ab
ATRAZINE	1	QT/A	SPIKE	B		
PROWL +	3.6	PT/A	SPIKE	B	7 a	2361 b
ATRAZINE	1	QT/A	SPIKE	B		
OUTLOOK	16	OZ/A	PREEM	A	10 a	3561 ab
BAS 45521H +	2.6	PT/A	MIDPOST	C		
DISTINCT +	4	OZ/A	MIDPOST	C		
NIS	0.4	PT/A	MIDPOST	C		
OUTLOOK	16	OZ/A	PREEM	A	9 a	3641 a
PROWL +	3.6	PT/A	SPIKE	B		
DISTINCT +	4	OZ/A	MIDPOST	C		
NIS	0.4	PT/A	MIDPOST	C		
LSD (P=.05)					3.2	1244.1
CV					28.85	31.67

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SWEET CORN- CALLISTO RATE AND TIMING TRIAL

Trial ID: CALRATETIMW 2002 Study Dir.: Dr. Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

COOPERATOR/LANDOWNER

Cooperator: Paul McMillen, Farm Mgr. Country: USA
Org: OARDC/East Badger Farm Phone No: 330-264-7008
Address 1: Ely Road
City: Wooster
State/Prov: Ohio
Postal Code: 44691

Conducted Under GLP (Y/N): N Conducted Under GEP (Y/N): N

Objective: Effect of .5, 1, and 2x rates of callisto PRE & POST on weed control and crop tolerance in sweet corn

CROP AND WEED DESCRIPTION

Weed	Code	Common Name	Scientific Name
1	CHEAL	common lambsquarter	Chenopodium album L.
2	AMBEL	common ragweed	Ambrosia artemesifolia L.
3	AMBTR	giant ragweed	Ambrosia trifida
4	CIRAR	Canada thistle	Cirsium arvense (L) SCOP.

Crop 1: ZEAMS SWEET CORN Variety: ROGERS GSS 0966 ATTRIBUTE
Planting Date: 05/10/02 Planting Method: CONVENTIONAL
Rate: 3 SEEDS/FT. Depth: 1.5 "
Row Spacing: 30 IN Seed Bed: CONVENTIONAL

SITE AND DESIGN

Plot Width, Unit: 10 FT Plot Length, Unit: 25 FT Reps: 4
Site Type: LEVEL FIELD
Tillage Type: CONVENTIONAL Study Design: RANDOMIZED COMPLETE BLOCK

MAINTENANCE

Field Prep./Maintenance: Field was plowed and disked late April. Planted and fertilized with 800#/A. of 19-19-19 on May 10.

SOIL DESCRIPTION

% Sand: 11 % OM: 3 Texture: SILT LOAM
% Silt: 75 pH: 6.0 Soil Name: WOOSTER SILT LOAM
% Clay: 14 CEC: 13 Fert. Level: MODERATE

APPLICATION DESCRIPTION

	A	B
Application Date:	5/10/2002	6/12/2002
Time of Day:	11-12 AM	10-11AM
Application Method:	SPRAY	SPRAY
Application Timing:	PRE	POST
Applic. Placement:	BDCST	BDCST
Air Temp., Unit:	50 f	80 F
% Relative Humidity:	55	85
Wind Velocity, Unit:	6 MPH	3 MPH
Dew Presence (Y/N):	N	N
% Cloud Cover:	0	70

CROP STAGE AT EACH APPLICATION

	A	B
Crop 1 Code, Stage:	ZEAMS PRI	ZEAMS POST
Stage Scale:	NONE	VEGET.
Height, Unit:	0 IN.	6 IN

WEED STAGE AT EACH APPLICATION

	A	B
Weed 1 Code, Stage:	CHEAL PRE	CHEAL POST
Stage Scale:	.	TO 4"
Density, Unit:	. .	MED .
Weed 2 Code, Stage:	AMBEL PRE	AMBEL POST
Stage Scale:	.	TO 6"
Density, Unit:	. .	MED .
Weed 3 Code, Stage:	AMBTR PRI	AMBTR POST
Stage Scale:	.	TO 8LF
Density, Unit:	. .	MED .
Weed 4 Code, Stage:	CIRAR PRE	CIRAR POST
Stage Scale:	.	TO 18 LF
Density, Unit:	. .	MED .

APPLICATION EQUIPMENT

	A	B
Appl. Equipment:	CO2 PLOT	CO2 PLOT
Operating Pressure:	35	35
Nozzle Type:	FLAT FAN	FLAT FAN
Nozzle Size:	8002VS	8002VS
Nozzle Spacing, Unit:	12	12
Nozzles/Row:	10	10
Boom Height, Unit:	18 IN	18 IN
Ground Speed, Unit:	4 MPH	4 MPH
Carrier:	WATER	WATER

The Ohio State University

SWEET CORN- CALLISTO RATE AND TIMING TRIAL

Trial ID: CALRATETIMW 2002 Study Dir.: Dr. Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Trial Comments

Weed counts are the sum of three, (50 x 50 cm.) quadrats per plot. Weed control ratings are from (0-100); 0= no control , and 100 = complete control. Plant injury ratings include percent chlorosis, stunt, and total injury, using the same scale. Yield data and stand counts were taken from a 10' length of row in plot center. Yield was measured in kg., and classified into "MKTB. (marketable) and "UNMARKET" (unmarketable) ears. We had a severe drought this summer which impacted crop growth & yield.

The Ohio State University

SWEET CORN- CALLISTO RATE AND TIMING TRIAL

Trial ID: CALRATETIMW 2002 Study Dir.: Dr. Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code						CHEAL	AMBEL	AMBTR	CIRAR
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					PLANT	WEED	WEED	WEED	WEED
Rating Data Type					INJURY	CONTROL	CONTROL	CONTROL	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/7/2002	6/7/2002	6/7/2002	6/7/2002	6/7/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	1	2	3	4	5
UNTREATED CONTROL					0 a	0 b	0 c	0 b	0 d
WEED FREE CONTROL					0 a	99 a	99 a	99 a	99 a
CALLISTO+	1.5	OZ/A	POST<5"	B	0 a				
COC+	1.6	PT/A	POST<5"	B					
UAN	4	PT/A	POST<5"	B					
CALLISTO+	3	OZ/A	POST<5"	B	0 a	99 a	25 b	99 a	85 ab
COC+	1.6	PT/A	POST<5"	B					
UAN	4	PT/A	POST<5"	B					
CALLISTO+	6	OZ/A	POST<5"	B	0 a				
COC+	1.6	PT/A	POST<5"	B					
UAN	4	PT/A	POST<5"	B					
CALLISTO+	5	OZ/A	PRE	A	0 a	99 a	99 a	89 a	64 bc
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
CALLISTO+	6	OZ/A	PRE	A	0 a	99 a	97 a	94 a	65 bc
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
CALLISTO+	7	OZ/A	PRE	A	0 a	99 a	99 a	99 a	51 c
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
CALLISTO+	8	OZ/A	PRE	A	0 a	99 a	99 a	97 a	43 c
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
CALLISTO+	12	OZ/A	PRE	A	0 a	99 a	84 a	94 a	66 bc
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
LSD (P=.05)					0	0	17	14	28.6
CV					0	0	15.25	11.21	32.63

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SWEET CORN- CALLISTO RATE AND TIMING TRIAL

Trial ID: CALRATETIMW 2002 Study Dir.: Dr. Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					CHEAL	AMBEL	AMBTR	CIRAR	
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					WEED	WEED	WEED	WEED	PLANT
Rating Data Type					COUNTS	COUNTS	COUNTS	COUNTS	CHLOROSIS
Rating Unit					PER PLOT	PER PLOT	PER PLOT	PER PLOT	PERCENT
Rating Date					6/13/2002	6/13/2002	6/13/2002	6/13/2002	6/27/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	6	7	8	9	10
UNTREATED CONTROL					3 a	8 a	1 ab	22 a	0 c
WEED FREE CONTROL					2 a	5 ab	1 ab	14 abc	0 c
CALLISTO+	1.5	OZ/A	POST<5"	B	3 a	4 ab	1 ab	20 ab	3 c
COC+	1.6	PT/A	POST<5"	B					
UAN	4	PT/A	POST<5"	B					
CALLISTO+	3	OZ/A	POST<5"	B	4 a	9 a	3 a	8 bc	9 b
COC+	1.6	PT/A	POST<5"	B					
UAN	4	PT/A	POST<5"	B					
CALLISTO+	6	OZ/A	POST<5"	B	3 a	9 a	1 ab	18 ab	13 a
COC+	1.6	PT/A	POST<5"	B					
UAN	4	PT/A	POST<5"	B					
CALLISTO+	5	OZ/A	PRE	A	0 a	0 b	0 b	5 c	3 c
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
CALLISTO+	6	OZ/A	PRE	A	0 a	0 b	0 b	13 abc	0 c
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
CALLISTO+	7	OZ/A	PRE	A	0 a	0 b	0 b	9 bc	0 c
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
CALLISTO+	8	OZ/A	PRE	A	0 a	0 b	0 b	9 bc	0 c
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
CALLISTO+	12	OZ/A	PRE	A	0 a	2 ab	0 b	9 bc	0 c
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
LSD (P=.05)					4.2	7.7	2.7	11.9	3.1
CV					200.19	146.59	367.78	64.98	82.58

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SWEET CORN- CALLISTO RATE AND TIMING TRIAL

Trial ID: CALRATETIMW 2002 Study Dir.: Dr. Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					ZEAMS	ZEAMS	CHEAL ZEAMS	AMBEL ZEAMS	AMBTR ZEAMS
Part Rated					PLANT	PLANT	WEED	WEED	WEED
Rating Data Type					STUNTING	INJURY	CONTROL	CONTROL	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/27/2002	6/27/2002	6/27/2002	6/27/2002	6/27/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	11	12	13	14	15
UNTREATED CONTROL					0 c	0 c	0 b	0 c	0 c
WEED FREE CONTROL					0 c	0 c	99 a	99 a	99 a
CALLISTO+	1.5	OZ/A	POST<5"	B	4 bc	4 bc	99 a	99 a	99 a
COC+	1.6	PT/A	POST<5"	B					
UAN	4	PT/A	POST<5"	B					
CALLISTO+	3	OZ/A	POST<5"	B	5 abc	7 ab	99 a	99 a	99 a
COC+	1.6	PT/A	POST<5"	B					
UAN	4	PT/A	POST<5"	B					
CALLISTO+	6	OZ/A	POST<5"	B	10 a	10 a	99 a	99 a	99 a
COC+	1.6	PT/A	POST<5"	B					
UAN	4	PT/A	POST<5"	B					
CALLISTO+	5	OZ/A	PRE	A	5 abc	5 abc	99 a	99 a	90 b
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
CALLISTO+	6	OZ/A	PRE	A	4 bc	4 bc	99 a	99 a	99 a
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
CALLISTO+	7	OZ/A	PRE	A	7 ab	7 ab	99 a	99 a	91 ab
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
CALLISTO+	8	OZ/A	PRE	A	6 ab	6 ab	99 a	99 a	99 a
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
CALLISTO+	12	OZ/A	PRE	A	9 ab	9 ab	99 a	77 b	94 ab
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
LSD (P=.05)					5.4	5.7	0	20.4	8.5
CV					75.73	76.54	0	16.2	6.77

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SWEET CORN- CALLISTO RATE AND TIMING TRIAL

Trial ID: CALRATETIMW 2002 Study Dir.: Dr. Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					CIRAR	CHEAL	AMBEL	AMBTR	CIRAR
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					WEED	WEED	WEED	WEED	WEED
Rating Data Type					CONTROL	COUNTS	COUNTS	COUNTS	COUNTS
Rating Unit					PERCENT	PER PLOT	PER PLOT	PER PLOT	PER PLOT
Rating Date					6/27/2002	6/27/2002	6/27/2002	6/27/2002	6/27/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	16	17	18	19	20
UNTREATED CONTROL					0 c	0 a	6 a	0 ab	20 a
WEED FREE CONTROL					74 a	0 a	0 b	0 b	0 e
CALLISTO+	1.5	OZ/A	POST<5"	B	41 b	0 a	1 b	0 b	4 cde
COC+	1.6	PT/A	POST<5"	B					
UAN	4	PT/A	POST<5"	B					
CALLISTO+	3	OZ/A	POST<5"	B	69 a	0 a	0 b	0 b	1 de
COC+	1.6	PT/A	POST<5"	B					
UAN	4	PT/A	POST<5"	B					
CALLISTO+	6	OZ/A	POST<5"	B	89 a	0 a	0 b	0 b	2 de
COC+	1.6	PT/A	POST<5"	B					
UAN	4	PT/A	POST<5"	B					
CALLISTO+	5	OZ/A	PRE	A	9 c	0 a	0 b	1 a	6 cde
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
CALLISTO+	6	OZ/A	PRE	A	8 c	0 a	0 b	0 b	16 ab
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
CALLISTO+	7	OZ/A	PRE	A	8 c	0 a	0 b	0 ab	10 bcd
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
CALLISTO+	8	OZ/A	PRE	A	8 c	0 a	0 b	0 b	8 b-e
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
CALLISTO+	12	OZ/A	PRE	A	9 c	0 a	1 b	0 b	12 abc
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
LSD (P=.05)					25.6	0	3.7	0.7	9.9
CV					56.27	0	338.67	412.4	88.61

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SWEET CORN- CALLISTO RATE AND TIMING TRIAL

Trial ID: CALRATETIMW 2002 Study Dir.: Dr. Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code						AMBEL	AMBTR	CIRAR	CIRAR
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					PLANT	WEED	WEED	WEED	WEED
Rating Data Type					INJURY	CONTROL	CONTROL	CONTROL	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/16/2002	7/16/2002	7/16/2002	7/16/2002	8/27/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	21	22	23	24	25
UNTREATED CONTROL					0 a	25 b	0 c	0 c	0 d
WEED FREE CONTROL					0 a	95 a	95 ab	71 ab	87 a
CALLISTO+	1.5	OZ/A	POST<5"	B	0 a	73 a	98 a	53 ab	68 ab
COC+	1.6	PT/A	POST<5"	B					
UAN	4	PT/A	POST<5"	B					
CALLISTO+	3	OZ/A	POST<5"	B	0 a	95 a	96 ab	80 a	83 a
COC+	1.6	PT/A	POST<5"	B					
UAN	4	PT/A	POST<5"	B					
CALLISTO+	6	OZ/A	POST<5"	B	3 a	99 a	99 a	63 ab	84 a
COC+	1.6	PT/A	POST<5"	B					
UAN	4	PT/A	POST<5"	B					
CALLISTO+	5	OZ/A	PRE	A	5 a	99 a	80 b	53 ab	43 bc
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
CALLISTO+	6	OZ/A	PRE	A	6 a	94 a	91 ab	56 ab	38 bc
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
CALLISTO+	7	OZ/A	PRE	A	5 a	99 a	85 ab	38 b	14 cd
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
CALLISTO+	8	OZ/A	PRE	A	6 a	99 a	92 ab	38 b	26 cd
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
CALLISTO+	12	OZ/A	PRE	A	0 a	89 a	92 ab	44 b	34 c
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
LSD (P=.05)					6.7	27.9	16.9	33.8	30.8
CV					184.99	22.14	14.11	47.17	44.71

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SWEET CORN- CALLISTO RATE AND TIMING TRIAL

Trial ID: CALRATETIMW 2002 Study Dir.: Dr. Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					AMBTR	AMBEL	CIRAR	AMBTR	AMBEL
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					WEED	WEED	WEED	WEED	WEED
Rating Data Type					CONTROL	CONTROL	COUNTS	COUNTS	COUNTS
Rating Unit					PERCENT	PERCENT	PER PLOT	PER PLOT	PER PLOT
Rating Date					8/27/2002	8/27/2002	8/27/2002	8/27/2002	8/27/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	26	27	28	29	30
UNTREATED CONTROL					0 c	0 c	13 a	1 a	5 a
WEED FREE CONTROL					99 a	90 a	8 a-d	0 a	0 b
CALLISTO+	1.5	OZ/A	POST<5"	B	98 a	60 b	6 a-d	0 a	2 b
COC+	1.6	PT/A	POST<5"	B					
UAN	4	PT/A	POST<5"	B					
CALLISTO+	3	OZ/A	POST<5"	B	82 ab	86 a	2 d	0 a	0 b
COC+	1.6	PT/A	POST<5"	B					
UAN	4	PT/A	POST<5"	B					
CALLISTO+	6	OZ/A	POST<5"	B	99 a	99 a	4 cd	0 a	0 b
COC+	1.6	PT/A	POST<5"	B					
UAN	4	PT/A	POST<5"	B					
CALLISTO+	5	OZ/A	PRE	A	60 b	99 a	5 bcd	0 a	0 b
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
CALLISTO+	6	OZ/A	PRE	A	96 a	93 a	12 ab	0 a	0 b
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
CALLISTO+	7	OZ/A	PRE	A	77 ab	94 a	13 a	0 a	0 b
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
CALLISTO+	8	OZ/A	PRE	A	80 ab	99 a	11 abc	0 a	0 b
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
CALLISTO+	12	OZ/A	PRE	A	85 ab	87 a	10 abc	0 a	1 b
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
LSD (P=.05)					25.4	18.4	7.7	0.8	2.9
CV					22.6	15.74	61.86	346.65	222.74

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SWEET CORN- CALLISTO RATE AND TIMING TRIAL

Trial ID: CALRATETIMW 2002 Study Dir.: Dr. Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					PLANTS	EARS	EARS	EARS	EARS
Rating Data Type					STAND CT.	MKTBL.NO.	MKTBL.WT	UNMKT.NO.	UNMKT.NO.
Rating Unit					PER 10'	PER 10'	TONS/A.	PER 10'	TONS/A.
Rating Date					8/22/2002	8/22/2002	8/22/2002	8/22/2002	8/22/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	31	32	34	35	37
UNTREATED CONTROL					11 b	1 b	0.4 bc	2 c	0.3 b
WEED FREE CONTROL					12 ab	6 a	2.5 a	5 abc	1 ab
CALLISTO+	1.5	OZ/A	POST<5"	B	12 ab	3 ab	1.1 bc	4 bc	0.7 ab
COC+	1.6	PT/A	POST<5"	B					
UAN	4	PT/A	POST<5"	B					
CALLISTO+	3	OZ/A	POST<5"	B	12 ab	4 ab	1.3 abc	3 bc	0.6 ab
COC+	1.6	PT/A	POST<5"	B					
UAN	4	PT/A	POST<5"	B					
CALLISTO+	6	OZ/A	POST<5"	B	13 ab	4 ab	1.6 ab	5 abc	1 ab
COC+	1.6	PT/A	POST<5"	B					
UAN	4	PT/A	POST<5"	B					
CALLISTO+	5	OZ/A	PRE	A	12 ab	4 ab	1.2 bc	5 abc	1.1 a
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
CALLISTO+	6	OZ/A	PRE	A	12 ab	2 b	0.4 bc	4 abc	0.8 ab
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
CALLISTO+	7	OZ/A	PRE	A	13 ab	1 b	0.3 c	9 a	1.3 a
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
CALLISTO+	8	OZ/A	PRE	A	12 ab	1 b	0.4 bc	6 abc	1 ab
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
CALLISTO+	12	OZ/A	PRE	A	15 a	2 b	0.8 bc	7 ab	1.3 a
COC+	1.6	PT/A	PRE	A					
UAN	4	PT/A	PRE	A					
LSD (P=.05)					3.3	3.1	1.25	4.4	0.82
CV					18.89	80.47	86.12	61.5	62.38

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SWEET CORN- CALLISTO ADJUVANT SYSTEMS

Trial ID: CALADJW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

COOPERATOR/LANDOWNER

Cooperator: Paul McMillen, Farm MGR. Country: USA
Org: OARDC/East Badger Farm Phone No: 330-264-7008
Address 1: Ely Road
City: Wooster
State/Prov: Ohio
Postal Code: 44691

Conducted Under GLP (Y/N): N Conducted Under GEP (Y/N): N

Objective: Effect of various adjuvant systems on weeed control and crop tolerance to Callisto.

CROP AND WEED DESCRIPTION

Weed	Code	Common Name	Scientific Name
1	CHEAL	common lambsquarter	Chenopodium album L.
2	AGRASS	annual grasses (various)	Setaria spp.and Digitaria spp.
3	AMBEL	common ragweed	Ambrosia artemesifolia L.
4	POLPY	Pennsylvania smartweed	Polygonum pensylvanicum L.
5	AMBTR	giant ragweed	Ambrosia trifida
6	CIRAR	Canada thistle	Cirsium arvense (L) SCOP.

Crop 1: ZEAMS SWEET CORN Variety: ROGERS 966 ATTRIBUTE
Planting Date: 05/23/02 Planting Method: CONVENTIONAL
Rate: 3 SEED/FT. Depth: 1.5 IN
Row Spacing: 30 IN Seed Bed: CONVENTIONAL
Soil Moisture: MOIST

SITE AND DESIGN

Plot Width, Unit: 10 FT Plot Length, Unit: 25 FT Reps: 4
Site Type: LEVEL FIELD
Tillage Type: CONVENTIONAL Study Design: RANDOMIZED COMPLETE BLOCK

MAINTENANCE

Field Prep./Maintenance: Field was plowed and disked in late April. Corn was planted, and fertilizer was applied at 800#/A.(19-19-19), on May 10.

SOIL DESCRIPTION

% Sand: 11 % OM: 3 Texture: SILT LOAM
% Silt: 75 pH: 6.0 Soil Name: WOOSTER SILT LOAM
% Clay: 14 CEC: 13 Fert. Level: MODERATE

APPLICATION DESCRIPTION

	A
Application Date:	6/12/2002
Time of Day:	2-3 PM
Application Method:	SPRAY
Application Timing:	POST
Applic. Placement:	BDCST
Air Temp., Unit:	80 F
% Relative Humidity:	85
Wind Velocity, Unit:	3 MPH
Dew Presence (Y/N):	N
% Cloud Cover:	80

CROP STAGE AT EACH APPLICATION

	A
Crop 1 Code, Stage:	ZEAMS POST
Stage Scale:	4 LEAF
Height, Unit:	6 IN.

WEED STAGE AT EACH APPLICATION

	A
Weed 1 Code, Stage:	CHEAL POST
Stage Scale:	1-3"
Density, Unit:	MED
Weed 2 Code, Stage:	AGRAS POST
Stage Scale:	1-3"
Density, Unit:	MED
Weed 3 Code, Stage:	AMBEL POST
Stage Scale:	TO 2"
Density, Unit:	LOW
Weed 4 Code, Stage:	POLPY POST
Stage Scale:	1-2"
Density, Unit:	MED
Weed 5 Code, Stage:	AMBTR POST
Stage Scale:	4 LF/3"
Density, Unit:	MED
Weed 6 Code, Stage:	CIRAR POST
Stage Scale:	12 LF/12"
Density, Unit:	MED

APPLICATION EQUIPMENT

	A
Appl. Equipment:	CO2 PLOT
Operating Pressure:	35
Nozzle Type:	FLAT FAN
Nozzle Size:	8002VS
Nozzle Spacing, Unit:	12 IN
Nozzles/Row:	10
Band Width, Unit:	10 FT
Boom Height, Unit:	18 "
Ground Speed, Unit:	4 MPH

The Ohio State University

SWEET CORN- CALLISTO ADJUVANT SYSTEMS

Trial ID: CALADJW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Trial Comments

Weed counts are the sum of three, (50 x 50 cm.) quadrats per plot . Weed control ratings are from (0-100); 0= no control, and 100 = complete control. Plant injury ratings include percent chlorosis, stunt, and total injury, using the same scale. Yield data and stand counts were taken from a 10' length of row in plot center. Yield was measured in kg., and classified into "MKTB. (marketable) and "UNMARKET." (unmarketable) ears. We had a severe drought this summer which impacted crop growth & yield.

The Ohio State University

SWEET CORN- CALLISTO ADJUVANT SYSTEMS

Trial ID: CALADJW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	1	2	3	4	5
Weed Code					CIRAR	CHEAL	AMBEL	AMBTR	AGRASS
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					WEED	WEED	WEED	WEED	WEED
Rating Data Type					COUNT	COUNT	COUNT	COUNT	COUNT
Rating Unit					PER PLOT	PER PLOT	PER PLOT	PER PLOT	PER PLOT
Rating Date					6/13/2002	6/13/2002	6/13/2002	6/13/2002	6/13/2002
UNTREATED CONTROL					8 abc	6 ab	6 b	3 a	3 a
WEED FREE CONTROL					0 c	0 b	0 b	0 b	0 a
CALLISTO+	3	OZ/A	POST	A	8 abc	5 ab	8 b	1 b	1 a
NIS	0.4	PT/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	12 ab	8 ab	8 b	0 b	2 a
COC	1.6	PT/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	8 abc	10 a	26 ab	1 b	2 a
UAN	4	PT/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	7 bc	4 ab	6 b	1 b	1 a
NIS+	0.4	PT/A	POST	A					
UAN	4	PT/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	7 abc	9 a	82 a	0 b	2 a
COC+	1.6	PT/A	POST	A					
UAN	4	PT/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	14 ab	8 ab	7 b	1 ab	2 a
AMS	474	OZ/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	17 a	3 ab	12 ab	1 b	1 a
NIS+	0.4	PT/A	POST	A					
AMS	474	OZ/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	9 abc	6 ab	8 b	0 b	2 a
COC+	1.6	PT/A	POST	A					
AMS	474	OZ/A	POST	A					
LSD (P=.05)					10.4	8.1	70.7	2.4	3.3
CV					80.18	95.23	298.8	224.42	147.05

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SWEET CORN- CALLISTO ADJUVANT SYSTEMS

Trial ID: CALADJW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					POLPY				CIRAR
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					WEED	PLANT	PLANT	PLANT	WEED
Rating Data Type					COUNT	CHLOROSIS	STUNT	INJURY	% CONTRO
Rating Unit					PER PLOT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/13/2002	6/28/2002	6/28/2002	6/28/2002	6/28/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	6	7	8	9	10
UNTREATED CONTROL					0 a	0 c	0 b	0 c	0 d
WEED FREE CONTROL					0 a	0 c	0 b	0 c	99 a
CALLISTO+	3	OZ/A	POST	A	0 a	0 c	3 ab	3 bc	60 c
NIS	0.4	PT/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	1 a	1 bc	4 ab	4 ab	60 c
COC	1.6	PT/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	0 a	0 c	5 a	5 ab	68 bc
UAN	4	PT/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	0 a	0 c	5 a	5 ab	78 abc
NIS+	0.4	PT/A	POST	A					
UAN	4	PT/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	0 a	4 ab	5 a	6 a	85 ab
COC+	1.6	PT/A	POST	A					
UAN	4	PT/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	1 a	0 c	3 ab	3 bc	63 c
AMS	474	OZ/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	0 a	3 bc	6 a	6 a	60 c
NIS+	0.4	PT/A	POST	A					
AMS	474	OZ/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	1 a	6 a	4 ab	5 ab	75 bc
COC+	1.6	PT/A	POST	A					
AMS	474	OZ/A	POST	A					
LSD (P=.05)					1	2.7	3.9	3.6	22.3
CV					241.16	135.97	79.5	68.07	23.77

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SWEET CORN- CALLISTO ADJUVANT SYSTEMS

Trial ID: CALADJW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					CIRAR	CHEAL	AMBTR	AMBEL	AGRASS
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					WEED	WEED	WEED	WEED	WEED
Rating Data Type					COUNT	COUNT	COUNT	COUNT	COUNT
Rating Unit					PER PLOT	PER PLOT	PER PLOT	PER PLOT	PER PLOT
Rating Date					6/14/2002	6/14/2002	6/14/2002	6/14/2002	6/14/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	11	12	13	14	15
UNTREATED CONTROL					3 abc	2 ab	0 ab	2 abc	1 a
WEED FREE CONTROL					1 c	0 b	0 b	0 c	0 a
CALLISTO+	3	OZ/A	POST	A	3 abc	2 ab	0 ab	3 ab	0 a
NIS	0.4	PT/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	4 ab	3 ab	0 ab	3 ab	1 a
COC	1.6	PT/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	3 abc	3 a	0 ab	2 abc	1 a
UAN	4	PT/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	2 bc	1 ab	0 ab	4 ab	0 a
NIS+	0.4	PT/A	POST	A					
UAN	4	PT/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	2 bc	3 a	0 ab	1 bc	1 a
COC+	1.6	PT/A	POST	A					
UAN	4	PT/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	5 ab	3 ab	0 a	2 ab	1 a
AMS	474	OZ/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	6 a	1 ab	0 ab	4 a	0 a
NIS+	0.4	PT/A	POST	A					
AMS	474	OZ/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	3 abc	2 ab	0 b	3 ab	1 a
COC+	1.6	PT/A	POST	A					
AMS	474	OZ/A	POST	A					
LSD (P=.05)					3.3	2.7	0.4	2.4	1.1
CV					73.45	94.32	154.15	71.41	147.05

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SWEET CORN- CALLISTO ADJUVANT SYSTEMS

Trial ID: CALADJW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					POLPY		CIRAR	CHEAL	AMBEL
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					WEED	CROP	WEED	WEED	WEED
Rating Data Type					COUNT	AV.HEIGHT	CONTROL	CONTROL	CONTROL
Rating Unit					PER PLOT	CM.	PERCENT	PERCENT	PERCENT
Rating Date					6/14/2002	7/1/2002	7/17/2002	7/17/2002	7/17/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	16	17	18	19	20
UNTREATED CONTROL					0 a	73.8 bc	0 c	0 b	0 c
WEED FREE CONTROL					0 a	80.7 abc	99 a	99 a	99 a
CALLISTO+	3	OZ/A	POST	A	0 a	81.4 abc	80 b	99 a	97 ab
NIS	0.4	PT/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	0 a	82.2 ab	76 b	99 a	98 ab
COC	1.6	PT/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	0 a	86.8 a	74 b	99 a	99 a
UAN	4	PT/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	0 a	82.7 ab	85 ab	99 a	98 ab
NIS+	0.4	PT/A	POST	A					
UAN	4	PT/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	0 a	72.9 c	87 ab	99 a	97 ab
COC+	1.6	PT/A	POST	A					
UAN	4	PT/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	0 a	82.4 ab	74 b	99 a	93 b
AMS	474	OZ/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	0 a	78.9 abc	81 b	99 a	99 a
NIS+	0.4	PT/A	POST	A					
AMS	474	OZ/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	0 a	78.5 abc	86 ab	99 a	97 ab
COC+	1.6	PT/A	POST	A					
AMS	474	OZ/A	POST	A					
LSD (P=.05)					0.5	9	14.1	0	4.9
CV					221.26	7.75	13.08	0	3.88

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SWEET CORN- CALLISTO ADJUVANT SYSTEMS

Trial ID: CALADJW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	21	22	23	24
Weed Code					AMBTR	AGRASS	CIRAR	AMBEL
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					CONTROL	CONTROL	CONTROL	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/17/2002	7/17/2002	8/2/2002	8/2/2002
UNTREATED CONTROL					0 c	0 c	0 c	0 c
WEED FREE CONTROL					99 a	99 a	98 a	99 a
CALLISTO+	3	OZ/A	POST	A	99 a	89 ab	85 a	98 a
NIS	0.4	PT/A	POST	A				
CALLISTO+	3	OZ/A	POST	A	99 a	82 b	78 a	96 a
COC	1.6	PT/A	POST	A				
CALLISTO+	3	OZ/A	POST	A	99 a	79 b	82 a	99 a
UAN	4	PT/A	POST	A				
CALLISTO+	3	OZ/A	POST	A	99 a	83 b	89 a	97 a
NIS+	0.4	PT/A	POST	A				
UAN	4	PT/A	POST	A				
CALLISTO+	3	OZ/A	POST	A	99 a	85 b	90 a	96 a
COC+	1.6	PT/A	POST	A				
UAN	4	PT/A	POST	A				
CALLISTO+	3	OZ/A	POST	A	92 b	83 b	51 b	71 b
AMS	474	OZ/A	POST	A				
CALLISTO+	3	OZ/A	POST	A	99 a	87 ab	84 a	99 a
NIS+	0.4	PT/A	POST	A				
AMS	474	OZ/A	POST	A				
CALLISTO+	3	OZ/A	POST	A	99 a	87 ab	85 a	99 a
COC+	1.6	PT/A	POST	A				
AMS	474	OZ/A	POST	A				
LSD (P=.05)					3.7	12.1	21.8	22.2
CV					2.89	10.77	20.32	17.93

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SWEET CORN- CALLISTO ADJUVANT SYSTEMS

Trial ID: CALADJW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					AMBTR	AGRASS		AGRASS	CIRAR	AMBEL
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					WEED	WEED	PLANT	WEED	WEED	WEED
Rating Data Type					CONTROL	CONTROL	INJURY	COUNT	COUNT	COUNT
Rating Unit					PERCENT	PERCENT	PERCENT	PER PLOT	PER PLOT	PER PLOT
Rating Date					8/2/2002	8/2/2002	8/2/2002	8/1/2002	8/1/2002	8/1/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	25	26	27	28	29	30
UNTREATED CONTROL					0 c	0 c	0 b	0 a	2 a	2 a
WEED FREE CONTROL					99 a	99 a	0 b	0 a	2 a	0 b
CALLISTO+	3	OZ/A	POST	A	99 a	91 a	4 ab	1 a	1 b	0 b
NIS	0.4	PT/A	POST	A						
CALLISTO+	3	OZ/A	POST	A	99 a	85 ab	4 ab	1 a	1 ab	0 b
COC	1.6	PT/A	POST	A						
CALLISTO+	3	OZ/A	POST	A	99 a	85 ab	6 a	1 a	1 b	0 b
UAN	4	PT/A	POST	A						
CALLISTO+	3	OZ/A	POST	A	99 a	88 ab	4 ab	0 a	1 b	0 b
NIS+	0.4	PT/A	POST	A						
UAN	4	PT/A	POST	A						
CALLISTO+	3	OZ/A	POST	A	99 a	92 a	0 b	1 a	1 b	0 b
COC+	1.6	PT/A	POST	A						
UAN	4	PT/A	POST	A						
CALLISTO+	3	OZ/A	POST	A	74 b	68 b	3 ab	1 a	1 ab	1 ab
AMS	474	OZ/A	POST	A						
CALLISTO+	3	OZ/A	POST	A	99 a	90 ab	3 ab	0 a	2 ab	0 b
NIS+	0.4	PT/A	POST	A						
AMS	474	OZ/A	POST	A						
CALLISTO+	3	OZ/A	POST	A	99 a	85 ab	3 ab	1 a	1 b	0 b
COC+	1.6	PT/A	POST	A						
AMS	474	OZ/A	POST	A						
LSD (P=.05)					22.7	23.3	6.2	1.5	1.1	1.1
CV					18.07	20.58	170.4	178.77	65.41	230.71

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SWEET CORN- CALLISTO ADJUVANT SYSTEMS

Trial ID: CALADJW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					AMBTR	CHEAL			
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					WEED	WEED	PLANTS	EARS	EARS
Rating Data Type					COUNT	COUNT	STAND COUNT	MKTB.NO.	MKTB. WT.
Rating Unit					PER PLOT	PER PLOT	PER 10'	PER 10'	LBS./A.
Rating Date					8/1/2002	8/1/2002	8/22/2002	8/22/2002	8/22/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	31	32	33	34	36
UNTREATED CONTROL					0 a	1 a	11 d	0 c	2806.1 b
WEED FREE CONTROL					0 b	0 a	11 cd	6 a	5862.9 a
CALLISTO+	3	OZ/A	POST	A	0 b	0 a	12 a-d	5 ab	2652.5 b
NIS	0.4	PT/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	0 b	0 a	11 bcd	4 ab	3292 b
COC	1.6	PT/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	0 b	0 a	13 abc	4 b	2861.8 b
UAN	4	PT/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	0 b	0 a	11 cd	3 b	3148 b
NIS+	0.4	PT/A	POST	A					
UAN	4	PT/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	0 b	0 a	12 a-d	4 b	3767.1 b
COC+	1.6	PT/A	POST	A					
UAN	4	PT/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	0 b	1 a	11 d	2 bc	3200.8 b
AMS	474	OZ/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	0 b	0 a	13 ab	4 ab	4215.9 ab
NIS+	0.4	PT/A	POST	A					
AMS	474	OZ/A	POST	A					
CALLISTO+	3	OZ/A	POST	A	0 b	0 a	13 a	3 b	2722.2 b
COC+	1.6	PT/A	POST	A					
AMS	474	OZ/A	POST	A					
LSD (P=.05)					0.2	0.6	1.8	2.3	1889.63
CV					632.46	348.63	10.76	47.04	37.1

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SWEET CORN- CALLISTO ADJUVANT SYSTEMS

Trial ID: CALADJW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	37	39
Weed Code						
Crop Code					ZEAMS	ZEAMS
Part Rated					EARS	EARS
Rating Data Type					UNMKT. NO.	UNMKT. WT.
Rating Unit					PER 10'	LBS./A.
Rating Date					8/22/2002	8/22/2002
UNTREATED CONTROL					5 b	1167.8 c
WEED FREE CONTROL					4 b	2120.4 abc
CALLISTO+	3	OZ/A	POST	A	6 ab	2857 ab
NIS	0.4	PT/A	POST	A		
CALLISTO+	3	OZ/A	POST	A	5 b	2360.5 abc
COC	1.6	PT/A	POST	A		
CALLISTO+	3	OZ/A	POST	A	5 b	1777.6 bc
UAN	4	PT/A	POST	A		
CALLISTO+	3	OZ/A	POST	A	6 ab	3008.7 ab
NIS+	0.4	PT/A	POST	A		
UAN	4	PT/A	POST	A		
CALLISTO+	3	OZ/A	POST	A	6 ab	2630.4 abc
COC+	1.6	PT/A	POST	A		
UAN	4	PT/A	POST	A		
CALLISTO+	3	OZ/A	POST	A	7 ab	2651.5 abc
AMS	474	OZ/A	POST	A		
CALLISTO+	3	OZ/A	POST	A	6 ab	2430.6 abc
NIS+	0.4	PT/A	POST	A		
AMS	474	OZ/A	POST	A		
CALLISTO+	3	OZ/A	POST	A	8 a	3532.1 a
COC+	1.6	PT/A	POST	A		
AMS	474	OZ/A	POST	A		
LSD (P=.05)					3.1	1606.64
CV					37.2	44.87

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SWEET CORN- CALLISTO AND ATRAZINE TANK MIXES

Trial ID: CALATRTANKW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

COOPERATOR/LANDOWNER

Cooperator: Paul McMillen, Farm Mgr.
Org: OARDC/East Badger Farm Phone No: 330-264-7008
Address 1: Ely Road
City: Wooster
State/Prov: Ohio
Postal Code: 44691

Conducted Under GLP (Y/N): N Conducted Under GEP (Y/N): N

Objective: Effect of Callisto, Callisto + Atrazine tank mixes on weed control and crop tolerance in sweet corn.

CROP AND WEED DESCRIPTION

Weed	Code	Common Name	Scientific Name
1	CHEAL	common lambsquarter	Chenopodium album L.
2	AGRASS	annual grasses (various)	Setaria spp., Digitaria spp.
3	AMBEL	common ragweed	Ambrosia artemisiifolia L.
4	POLPY	Pennsylvania smartweed	Polygonum pensylvanicum L.
5	AMBTR	giant ragweed	Ambrosia trifida L.
6	CIRAR	Canada thistle	Cirsium arvense (L) Scop.

Crop 1: ZEAMS SWEET CORN Variety: ROGERS 0966 ATTRIBUTE
Planting Date: 05/10/02 Planting Method: CONVENTIONAL
Rate: 3 SEEDS/FT. Depth: 2 IN
Row Spacing: 30 IN Seed Bed: CONVENTIONAL
Soil Moisture: MOIST

SITE AND DESIGN

Plot Width, Unit: 10 FT Plot Length, Unit: 25 FT Reps: 4
Site Type: FIELD
Tillage Type: CONVENTIONAL Study Design: RANDOMIZED COMPLETE BLOCK

MAINTENANCE

Field Prep./Maintenance: Applied Dual @ 1qt/A.on 5/16/02. Field was plowed and disked in late April. Corn was planted on May 10, and fertilized with 800# (19-19-19) /A.

SOIL DESCRIPTION

% Sand: 11 % OM: 3 Texture: SILT LOAM
% Silt: 75 pH: 6.0 Soil Name: WOOSTER SILT LOAM
% Clay: 14 CEC: 13 Fert. Level: MODERATE

APPLICATION DESCRIPTION

	A	B
Application Date:	5/15/2002	6/12/2002
Time of Day:	8-9 AM	9-10 AM
Application Method:	SPRAY	SPRAY
Application Timing:	PRE	POST
Applic. Placement:	BDCST	BDCST
Air Temp., Unit:	50 F	80 F
% Relative Humidity:	90	85
Wind Velocity, Unit:	7 MPH	3 MPH
% Cloud Cover:	0	80

CROP STAGE AT EACH APPLICATION

	A	B
Crop 1 Code, Stage:	ZEAMS PRI	ZEAMS POST
Stage Scale:	.	VEGET.
Height, Unit:	0. .	6 IN

WEED STAGE AT EACH APPLICATION

	A	B
Weed 1 Code, Stage:	CHEAL PRE	CHEAL POST
Stage Scale:	.	TO 10 LF
Density, Unit:	. .	LOW
Weed 2 Code, Stage:	AGRAS PRI	AGRAS POST
Stage Scale:	.	TO 6" HI
Density, Unit:	. .	LOW
Weed 3 Code, Stage:	AMBEL PRE	AMBEL POST
Stage Scale:	.	TO 6 LF.
Density, Unit:	. .	MED
Weed 4 Code, Stage:	POLPY PRE	POLPY POST
Stage Scale:	.	TO 4" HI
Density, Unit:	. .	MED
Weed 5 Code, Stage:	AMBTR PRI	AMBTR POST
Stage Scale:	.	TO 8 HI
Density, Unit:	. .	LOW
Weed 6 Code, Stage:	CIRAR PRE	CIRAR POST
Stage Scale:	.	TO 18" HI
Density, Unit:	. .	LOW

APPLICATION EQUIPMENT

	A	B
Appl. Equipment:	CO2 PLOT	CO2 PLOT
Operating Pressure:	35	35
Nozzle Type:	FLAT FAN	FLAT FAN
Nozzle Size:	8002VS	8002VS
Nozzle Spacing, Unit:	12 IN	12 IN
Nozzles/Row:	10	10
Band Width, Unit:	10 FT	10 FT
Boom Height, Unit:	18	18
Ground Speed, Unit:	4	4

The Ohio State University

SWEET CORN- CALLISTO AND ATRAZINE TANK MIXES

Trial ID: CALATRTANKW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Trial Comments

Weed counts are the sum of three, (50 x 50 cm.) quadrats per plot . Weed control ratings are from (0-100); 0= no control and 100 = complete control. Plant injury ratings include percent chlorosis, stunt, and total injury, using the same scale. Yield data and stand counts were taken from a 10' length of row in plot center. Yield was measured in kg., and classified into "MKTB". (marketable) , and "UNMARKET." (unmarketable) ears. We had a severe drought this summer which impacted crop growth & yield.

The Ohio State University

SWEET CORN- CALLISTO AND ATRAZINE TANK MIXES

Trial ID: CALATRTANKW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code						CHEAL	AMBEL	AMBTR	CIRAR
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					PLANT	WEED	WEED	WEED	WEED
Rating Data Type					INJURY	CONTROL	CONTROL	CONTROL	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/6/2002	6/6/2002	6/6/2002	6/6/2002	6/6/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	1	2	3	4	5
UNTREATED CONTROL					0 a	0 c	0 c	0 b	0 e
WEED FREE CONTROL					0 a	99 a	99 a	99 a	99 a
CALLISTO	6	OZ/A	PRE	A	1 a	72 b	56 b	74 a	39 d
CALLISTO	7.7	OZ/A	PRE	A	0 a	99 a	63 ab	98 a	86 ab
CALLISTO+	5	OZ/A	PRE	A	0 a	99 a	53 b	72 a	66 bcd
ATRAZINE	2	PT/A	PRE	A					
CALLISTO+	6	OZ/A	PRE	A	0 a	99 a	56 b	99 a	67 bcd
ATRAZINE	2	PT/A	PRE	A					
CALLISTO+	6	OZ/A	PRE	A	1 a	99 a	52 b	72 a	72 abc
CALLISTO+	6	OZ/A	POST	B					
NIS+	1.6	PT/A	POST	B					
UAN	4	PT/A	POST	B					
CALLISTO+	6	OZ/A	POST	B	0 a				
NIS+	1.6	PT/A	POST	B					
UAN	4	PT/A	POST	B					
CALLISTO+	6	OZ/A	POST	B	0 a				
ATRAZINE+	0.5	PT/A	POST	B					
NIS+	1.6	PT/A	POST	B					
UAN	4	PT/A	POST	B					
CALLISTO+	6	OZ/A	POST	B	0 a				50 cd
ATRAZINE+	1	PT/A	POST	B					
NIS+	1.6	PT/A	POST	B					
UAN	4	PT/A	POST	B					
LSD (P=.05)					1.7	27	37.1	46.5	28.3
CV					455.42	22.44	45.93	42.41	31.78

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SWEET CORN- CALLISTO AND ATRAZINE TANK MIXES

Trial ID: CALATRTANKW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	6	7	8	9	10
Weed Code					ABUTH	CHEAL	AMBEL	AMBTR	CIRAR
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					WEED	WEED	WEED	WEED	WEED
Rating Data Type					COUNTS	COUNTS	COUNTS	COUNTS	COUNTS
Rating Unit					PER PLOT	PER PLOT	PER PLOT	PER PLOT	PER PLOT
Rating Date					6/13/2002	6/13/2002	6/13/2002	6/13/2002	6/13/2002
UNTREATED CONTROL					6 bc	0 a	9 bcd	0 a	11 a
WEED FREE CONTROL					17 a	1 a	12 ab	0 a	9 ab
CALLISTO	6	OZ/A	PRE	A	0 c	0 a	0 d	0 a	2 bc
CALLISTO	7.7	OZ/A	PRE	A	0 c	0 a	0 d	0 a	1 c
CALLISTO+	5	OZ/A	PRE	A	0 c	0 a	0 d	0 a	3 abc
ATRAZINE	2	PT/A	PRE	A					
CALLISTO+	6	OZ/A	PRE	A	0 c	0 a	0 d	0 a	0 c
ATRAZINE	2	PT/A	PRE	A					
CALLISTO+	6	OZ/A	PRE	A	0 c	0 a	2 cd	0 a	4 abc
CALLISTO+	6	OZ/A	POST	B					
NIS+	1.6	PT/A	POST	B					
UAN	4	PT/A	POST	B					
CALLISTO+	6	OZ/A	POST	B	11 ab	0 a	16 ab	1 a	7 abc
NIS+	1.6	PT/A	POST	B					
UAN	4	PT/A	POST	B					
CALLISTO+	6	OZ/A	POST	B	9 abc	0 a	18 a	0 a	8 abc
ATRAZINE+	0.5	PT/A	POST	B					
NIS+	1.6	PT/A	POST	B					
UAN	4	PT/A	POST	B					
CALLISTO+	6	OZ/A	POST	B	7 abc	0 a	9 abc	0 a	6 abc
ATRAZINE+	1	PT/A	POST	B					
NIS+	1.6	PT/A	POST	B					
UAN	4	PT/A	POST	B					
LSD (P=.05)					9.8	0.6	8.8	0.8	8.3
CV					134.3	380.06	93.65	429.3	113.95

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SWEET CORN- CALLISTO AND ATRAZINE TANK MIXES

Trial ID: CALATRTANKW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code						ZEAMS	ZEAMS	CIRAR ZEAMS	ZEAMS
Part Rated						PLANT	PLANT	WEED	CROP
Rating Data Type						STUNT	INJURY	% CONTRO	AV.HEIGHT
Rating Unit						PERCENT	PERCENT	PERCENT	CM.
Rating Date						6/28/2002	6/28/2002	6/28/2002	7/1/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl	11	12	13	14	15
UNTREATED CONTROL					c	0 d	0 e	0 c	71.8 b
WEED FREE CONTROL					c	0 d	0 e	74 a	79.5 ab
CALLISTO	6	OZ/A	PRE	A	c	5 cd	5 cde	19 bc	73.7 ab
CALLISTO	7.7	OZ/A	PRE	A	c	14 ab	14 ab	13 bc	62.5 c
CALLISTO+	5	OZ/A	PRE	A	c	5 cd	5 cde	35 b	75.1 ab
ATRAZINE	2	PT/A	PRE	A					
CALLISTO+	6	OZ/A	PRE	A	c	3 cd	3 de	3 c	75 ab
ATRAZINE	2	PT/A	PRE	A					
CALLISTO+	6	OZ/A	PRE	A	a	15 a	15 a	90 a	72 ab
CALLISTO+	6	OZ/A	POST	B					
NIS+	1.6	PT/A	POST	B					
UAN	4	PT/A	POST	B					
CALLISTO+	6	OZ/A	POST	B	ab	9 abc	9 bc	89 a	73.7 ab
NIS+	1.6	PT/A	POST	B					
UAN	4	PT/A	POST	B					
CALLISTO+	6	OZ/A	POST	B	ab	5 cd	7 cd	89 a	80.5 a
ATRAZINE+	0.5	PT/A	POST	B					
NIS+	1.6	PT/A	POST	B					
UAN	4	PT/A	POST	B					
CALLISTO+	6	OZ/A	POST	B	b	8 bc	8 cd	80 a	79.1 ab
ATRAZINE+	1	PT/A	POST	B					
NIS+	1.6	PT/A	POST	B					
UAN	4	PT/A	POST	B					
LSD (P=.05)						7.3	5.9	26	8.63
CV						80.3	62.13	36.45	8.01

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SWEET CORN- CALLISTO AND ATRAZINE TANK MIXES

Trial ID: CALATRTANKW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code						CHEAL	AMBEL	AMBTR	CIRAR
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					PLANT	WEED	WEED	WEED	WEED
Rating Data Type					INJURY	CONTROL	CONTROL	CONTROL	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/16/2002	6/16/2002	6/16/2002	6/16/2002	6/16/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl	16	17	18	19	20
UNTREATED CONTROL					0 b	0 c	0 c	0 c	0 d
WEED FREE CONTROL					0 b	98 b	98 a	98 ab	98 a
CALLISTO	6	OZ/A	PRE	A	0 b	99 a	99 a	99 a	66 bc
CALLISTO	7.7	OZ/A	PRE	A	3 a	99 a	95 b	96 b	76 abc
CALLISTO+	5	OZ/A	PRE	A	0 b	99 a	99 a	99 a	58 c
ATRAZINE	2	PT/A	PRE	A					
CALLISTO+	6	OZ/A	PRE	A	0 b	99 a	99 a	99 a	68 bc
ATRAZINE	2	PT/A	PRE	A					
CALLISTO+	6	OZ/A	PRE	A	0 b	99 a	99 a	99 a	91 ab
CALLISTO+	6	OZ/A	POST	B					
NIS+	1.6	PT/A	POST	B					
UAN	4	PT/A	POST	B					
CALLISTO+	6	OZ/A	POST	B	0 b	99 a	98 a	99 a	81 abc
NIS+	1.6	PT/A	POST	B					
UAN	4	PT/A	POST	B					
CALLISTO+	6	OZ/A	POST	B	0 b	99 a	99 a	99 a	84 abc
ATRAZINE+	0.5	PT/A	POST	B					
NIS+	1.6	PT/A	POST	B					
UAN	4	PT/A	POST	B					
CALLISTO+	6	OZ/A	POST	B	0 b	99 a	99 a	99 a	81 abc
ATRAZINE+	1	PT/A	POST	B					
NIS+	1.6	PT/A	POST	B					
UAN	4	PT/A	POST	B					
LSD (P=.05)					2.3	0.9	3.3	3.4	28.8
CV					632.46	0.71	2.56	2.62	28.24

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SWEET CORN- CALLISTO AND ATRAZINE TANK MIXES

Trial ID: CALATRTANKW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code						CIRAR	AMBEL	ABUTH	AMBTR
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					PLANT	WEED	WEED	WEED	WEED
Rating Data Type					CONTROL	CONTROL	CONTROL	CONTROL	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					8/2/2002	8/2/2002	8/2/2002	8/2/2002	8/2/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl	21	22	23	24	25
UNTREATED CONTROL					0 a	0 d	0 c	0 c	0 c
WEED FREE CONTROL					0 a	97 a	99 a	99 a	99 a
CALLISTO	6	OZ/A	PRE	A	0 a	75 abc	99 a	99 a	99 a
CALLISTO	7.7	OZ/A	PRE	A	0 a	81 abc	97 a	99 a	99 a
CALLISTO+	5	OZ/A	PRE	A	0 a	64 c	99 a	99 a	99 a
ATRAZINE	2	PT/A	PRE	A					
CALLISTO+	6	OZ/A	PRE	A	0 a	70 bc	72 b	74 b	74 b
ATRAZINE	2	PT/A	PRE	A					
CALLISTO+	6	OZ/A	PRE	A	0 a	95 ab	99 a	98 a	99 a
CALLISTO+	6	OZ/A	POST	B					
NIS+	1.6	PT/A	POST	B					
UAN	4	PT/A	POST	B					
CALLISTO+	6	OZ/A	POST	B	0 a	85 abc	99 a	99 a	99 a
NIS+	1.6	PT/A	POST	B					
UAN	4	PT/A	POST	B					
CALLISTO+	6	OZ/A	POST	B	0 a	88 abc	99 a	99 a	99 a
ATRAZINE+	0.5	PT/A	POST	B					
NIS+	1.6	PT/A	POST	B					
UAN	4	PT/A	POST	B					
CALLISTO+	6	OZ/A	POST	B	0 a	85 abc	99 a	99 a	99 a
ATRAZINE+	1	PT/A	POST	B					
NIS+	1.6	PT/A	POST	B					
UAN	4	PT/A	POST	B					
LSD (P=.05)					0	26.5	22.3	22.8	22.7
CV					0	24.73	17.83	18.13	18.07

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SWEET CORN- CALLISTO AND ATRAZINE TANK MIXES

Trial ID: CALATRTANKW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					CIRAR	AMBEL	ABUTH		
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					WEED	WEED	WEED	PLANTS	EARS
Rating Data Type					COUNTS	COUNTS	COUNTS	STAND COUNT	MKTBL.NO.
Rating Unit					PER PLOT	PER PLOT	PER PLOT	PER 10'	PER 10'
Rating Date					8/2/2002	8/2/2002	8/2/2002	8/22/2002	8/22/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl	26	27	28	29	30
UNTREATED CONTROL					6 a	11 a	4 a	7 b	1 c
WEED FREE CONTROL					5 a	0 b	0 b	12 a	5 a
CALLISTO	6	OZ/A	PRE	A	4 a	0 b	0 b	12 a	1 c
CALLISTO	7.7	OZ/A	PRE	A	2 a	0 b	0 b	11 a	2 c
CALLISTO+	5	OZ/A	PRE	A	4 a	0 b	0 b	10 a	3 abc
ATRAZINE	2	PT/A	PRE	A					
CALLISTO+	6	OZ/A	PRE	A	4 a	2 b	0 b	12 a	2 bc
ATRAZINE	2	PT/A	PRE	A					
CALLISTO+	6	OZ/A	PRE	A	0 a	0 b	0 b	11 a	4 ab
CALLISTO+	6	OZ/A	POST	B					
NIS+	1.6	PT/A	POST	B					
UAN	4	PT/A	POST	B					
CALLISTO+	6	OZ/A	POST	B	3 a	0 b	0 b	11 a	2 bc
NIS+	1.6	PT/A	POST	B					
UAN	4	PT/A	POST	B					
CALLISTO+	6	OZ/A	POST	B	2 a	0 b	0 b	10 a	2 bc
ATRAZINE+	0.5	PT/A	POST	B					
NIS+	1.6	PT/A	POST	B					
UAN	4	PT/A	POST	B					
CALLISTO+	6	OZ/A	POST	B	3 a	0 b	0 b	11 a	2 bc
ATRAZINE+	1	PT/A	POST	B					
NIS+	1.6	PT/A	POST	B					
UAN	4	PT/A	POST	B					
LSD (P=.05)					5.5	5.4	1.7	2.2	2
CV					118.36	303.2	265.36	14.16	63.67

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SWEET CORN- CALLISTO AND ATRAZINE TANK MIXES

Trial ID: CALATRTANKW 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code							
Crop Code					ZEAMS	ZEAMS	ZEAMS
Part Rated					EARS	EARS	EARS
Rating Data Type					MKTBL.WT	UNMKT.NO.	UNMKT.WT
Rating Unit					LBS./A.	PER 10'	LBS./A.
Rating Date					8/22/2002	8/22/2002	8/22/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl	32	33	35
UNTREATED CONTROL					412.9 b	1 c	336.1 b
WEED FREE CONTROL					3318 a	3 bc	1075.6 ab
CALLISTO	6	OZ/A	PRE	A	717.4 b	5 ab	1680.6 a
CALLISTO	7.7	OZ/A	PRE	A	969.9 b	6 ab	2074.3 a
CALLISTO+	5	OZ/A	PRE	A	1918.8 ab	5 ab	1603.8 a
ATRAZINE	2	PT/A	PRE	A			
CALLISTO+	6	OZ/A	PRE	A	1382.9 b	6 ab	2218.4 a
ATRAZINE	2	PT/A	PRE	A			
CALLISTO+	6	OZ/A	PRE	A	2977 a	5 ab	1642.2 a
CALLISTO+	6	OZ/A	POST	B			
NIS+	1.6	PT/A	POST	B			
UAN	4	PT/A	POST	B			
CALLISTO+	6	OZ/A	POST	B	1229.2 b	7 a	1632.6 a
NIS+	1.6	PT/A	POST	B			
UAN	4	PT/A	POST	B			
CALLISTO+	6	OZ/A	POST	B	1420.3 b	5 ab	1526.9 a
ATRAZINE+	0.5	PT/A	POST	B			
NIS+	1.6	PT/A	POST	B			
UAN	4	PT/A	POST	B			
CALLISTO+	6	OZ/A	POST	B	1409.8 b	4 ab	1747.8 a
ATRAZINE+	1	PT/A	POST	B			
NIS+	1.6	PT/A	POST	B			
UAN	4	PT/A	POST	B			
LSD (P=.05)					1515.96	2.8	1152.18
CV					66.31	43.89	51.1

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SWEET CORN- CALLISTO STAGE OF GROWTH STUDY

Trial ID: CALSTGRW 2002 Study Dir.: Dr. Douglas J. Doohan & T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

COOPERATOR/LANDOWNER

Cooperator: Paul McMillen, Farm Mgr. Country: USA
Org: OARDC/East Badger Farm Phone No: 330-264-7008
Address 1: Ely Road
City: Wooster
State/Prov: Ohio
Postal Code: 44691

Conducted Under GLP (Y/N): N Conducted Under GEP (Y/N): N

Objective: Effect of crop & weed stage of growth on performance & crop safety of Callisto and Callisto + atrazine tank mixes.

CROP AND WEED DESCRIPTION

Weed			
1	**Code**	**Common Name**	**Scientific Name**
2	CHEAL	common lambsquarter	Chenopodium album L.
3	AGRASS	annual grass	spp.
4	AMBEL	common ragweed	Ambrosia artemisiifolia L.
5	POLPY	Pennsylvania smartweed	Polygonum pensylvanicum L.
	AMBTR	giant ragweed	Ambrosia trifida L.

Crop 1: ZEAMS SWEET CORN Variety: ROGERS GSS 0966 ATTRIBUTE
Planting Date: 05/23/02 Planting Method: CONVENTIONAL
Rate: 3 SEEDS/FT. Depth: 1.5 "
Row Spacing: 30 " Seed Bed: CONVENTIONAL

SITE AND DESIGN

Plot Width, Unit: 10 FT Plot Length, Unit: 25 FT Reps: 4
Site Type: LEVEL FIELD
Tillage Type: CONVENTIONAL Study Design: RANDOMIZED COMPLETE BLOCK

MAINTENANCE

Field Prep./Maintenance: Field was plowed, and disked in late April; then planted and fertilized with 800#/A.(19-19-19) on May 10, 2002.

SOIL DESCRIPTION

% Sand: 11 % OM: 3 Texture: SILT LOAM
% Silt: 75 pH: 6.0 Soil Name: WOOSTER SILT LOAM
% Clay: 14 CEC: 13 Fert. Level: MODERATE

APPLICATION DESCRIPTION

Application Date:	**A**	**B**
Time of Day:	6/12/2002	6/19/2002
Application Method:	2-3 PM	11-12 AM
Application Timing:	SPRAY	SPRAY
Applic. Placement:	EPOST	LPOST
Air Temp., Unit:	BDCST	BDCST
% Relative Humidity:	80 F	70 F
Wind Velocity, Unit:	85	68
Dew Presence (Y/N):	3 MPH	3 MPH
% Cloud Cover:	N	N
	80	50

CROP STAGE AT EACH APPLICATION

Crop 1 Code, Stage:	**A**	**B**
Stage Scale:	ZEAMS EPOST	ZEAMS LPOST
Height, Unit:	VEGETAT.	VEGETAT.
	4 IN.	10 IN.

WEED STAGE AT EACH APPLICATION

Weed 1 Code, Stage:	**A**	**B**
Stage Scale:	CHEAL EPOST	CHEAL LPOST
Density, Unit:	TO 2"	> 5"
Weed 2 Code, Stage:	MED.	MED.
Stage Scale:	AGRAS EPOST	AGRAS
Density, Unit:	TO 2"	> 5"
Weed 3 Code, Stage:	MED.	MED.
Stage Scale:	AMBEL EPOST	AMBEL
Density, Unit:	TO 2"	> 5"
Weed 4 Code, Stage:	MED.	MED.
Stage Scale:	POLPY EPOST	POLPY
Density, Unit:	TO 2"	> 5"
Weed 5 Code, Stage:	MED.	MED.
Stage Scale:	AMBTR EPOST	AMBTR
Density, Unit:	TO 2"	>5"
	MED.	MED.

APPLICATION EQUIPMENT

Appl. Equipment:	**A**	**B**
Operating Pressure:	CO2 PLOT	CO2 PLOT
Nozzle Type:	35	35
Nozzle Size:	FLAT FAN	FLAT FAN
Nozzle Spacing, Unit:	8002VS	8002VS
Nozzles/Row:	12 "	12
Boom Height, Unit:	10	10
Ground Speed, Unit:	18 IN	18 IN
Carrier:	4 MPH	4 MPH
	WATER	WATER

The Ohio State University

SWEET CORN- CALLISTO STAGE OF GROWTH STUDY

Trial ID: CALSTGRW 2002 Study Dir.: Dr. Douglas J. Doohan & T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Trial Comments

Weed counts are the sum of three, (50 x 50 cm.) quadrats per plot . Yield data and stand counts (STAND CT.) were taken from a 10' length of row in plot center; yield is weighed in kg. Weed control ratings are from (0-100) ; 0= no control , & 100 = complete control. Corn injury ratings follow the same rating scheme and are classified into chlorosis, stunt, and total injury. We had a severe drought this summer which impacted crop growth & yield. For weed density, (med) = medium.

The Ohio State University

SWEET CORN- CALLISTO STAGE OF GROWTH STUDY

Trial ID: CALSTGRW 2002 Study Dir.: Dr. Douglas J. Doohan & T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	1	2	3	4	5
Weed Code						CIRAR	CHEAL	AMBEL	CIRAR
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					PLANT	WEED	WEED	WEED	WEED
Rating Data Type					INJURY	CONTROL	COUNTS	COUNTS	COUNTS
Rating Unit					PERCENT	PERCENT	PER PLOT	PER PLOT	PER PLOT
Rating Date					6/7/2002	6/7/2002	6/13/2002	6/13/2002	6/13/2002
UNTREATED CONTROL					0 b	0 c	0 a	8 bc	8 a
WEED FREE CONTROL					0 b	99 a	0 a	0 c	0 b
CALLISTO+	3	OZ/A	EPOS 2"W	A	5 ab	94 ab	2 a	15 ab	6 ab
COC+	1.6	PT/A	EPOS 2"W	A					
UAN	4	PT/A	EPOS 2"W	A					
CALLISTO+	3	OZ/A	LPOS>5"	B	5 ab	99 a	2 a	12 ab	5 ab
COC+	1.6	PT/A	LPOS>5"	B					
UAN	4	PT/A	LPOS>5"	B					
CALLISTO+	3	OZ/A	EPOS 2"W	A	6 a	90 b	3 a	10 ab	7 ab
ATRAZINE	1	PT/A	EPOS 2"W	A					
COC+	1.6	PT/A	EPOS 2"W	A					
UAN	4	PT/A	EPOS 2"W	A					
CALLISTO+	3	OZ/A	LPOS>5"	B	5 ab	96 ab	3 a	11 ab	10 a
ATRAZINE	1	PT/A	LPOS>5"	B					
COC+	1.6	PT/A	LPOS>5"	B					
UAN	4	PT/A	LPOS>5"	B					
CALLISTO+	1.5	OZ/A	EPOS 2"W	A	4 ab	92 ab	1 a	14 ab	7 ab
COC+	1.6	PT/A	EPOS 2"W	A					
UAN	4	PT/A	EPOS 2"W	A					
CALLISTO+	1.5	OZ/A	LPOS>5"	B	4 ab	95 ab	2 a	15 ab	10 a
COC+	1.6	PT/A	LPOS>5"	B					
UAN	4	PT/A	LPOS>5"	B					
CALLISTO+	1.5	OZ/A	EPOS 2"W	A	5 ab	97 ab	4 a	18 a	11 a
ATRAZINE	1	PT/A	EPOS 2"W	A					
COC+	1.6	PT/A	EPOS 2"W	A					
UAN	4	PT/A	EPOS 2"W	A					
CALLISTO+	1.5	OZ/A	LPOS>5"	B	4 ab	96 ab	1 a	13 ab	6 ab
ATRAZINE	1	PT/A	LPOS>5"	B					
COC+	1.6	PT/A	LPOS>5"	B					
UAN	4	PT/A	LPOS>5"	B					
LSD (P=.05)					5.2	7.1	4.3	9.1	7.6
CV					96.35	5.75	171.16	54.82	76.61

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SWEET CORN- CALLISTO STAGE OF GROWTH STUDY

Trial ID: CALSTGRW 2002 Study Dir.: Dr. Douglas J. Doohan & T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					ZEAMS	ZEAMS	ZEAMS	CIRAR ZEAMS	ZEAMS
Part Rated					PLANT	PLANT	PLANT	WEED	PLANT
Rating Data Type					CHLOROSIS	STUNT	INJURY	CONTROL	INJURY
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/28/2002	6/28/2002	6/28/2002	6/28/2002	7/16/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	6	7	8	9	10
UNTREATED CONTROL					1 d	0 d	0 d	0 b	0 a
WEED FREE CONTROL					0 d	0 d	0 d	73 a	0 a
CALLISTO+	3	OZ/A	EPOS 2"W	A	6 bc	5 ab	6 b	91 a	0 a
COC+	1.6	PT/A	EPOS 2"W	A					
UAN	4	PT/A	EPOS 2"W	A					
CALLISTO+	3	OZ/A	LPOS>5"	B	4 cd	4 bc	4 bc	93 a	0 a
COC+	1.6	PT/A	LPOS>5"	B					
UAN	4	PT/A	LPOS>5"	B					
CALLISTO+	3	OZ/A	EPOS 2"W	A	11 a	8 a	10 a	91 a	0 a
ATRAZINE	1	PT/A	EPOS 2"W	A					
COC+	1.6	PT/A	EPOS 2"W	A					
UAN	4	PT/A	EPOS 2"W	A					
CALLISTO+	3	OZ/A	LPOS>5"	B	10 ab	1 cd	5 b	95 a	0 a
ATRAZINE	1	PT/A	LPOS>5"	B					
COC+	1.6	PT/A	LPOS>5"	B					
UAN	4	PT/A	LPOS>5"	B					
CALLISTO+	1.5	OZ/A	EPOS 2"W	A	3 cd	4 bc	4 bc	88 a	0 a
COC+	1.6	PT/A	EPOS 2"W	A					
UAN	4	PT/A	EPOS 2"W	A					
CALLISTO+	1.5	OZ/A	LPOS>5"	B	1 d	4 bc	4 bc	89 a	0 a
COC+	1.6	PT/A	LPOS>5"	B					
UAN	4	PT/A	LPOS>5"	B					
CALLISTO+	1.5	OZ/A	EPOS 2"W	A	1 d	0 d	0 d	92 a	0 a
ATRAZINE	1	PT/A	EPOS 2"W	A					
COC+	1.6	PT/A	EPOS 2"W	A					
UAN	4	PT/A	EPOS 2"W	A					
CALLISTO+	1.5	OZ/A	LPOS>5"	B	0 d	1 cd	1 cd	95 a	0 a
ATRAZINE	1	PT/A	LPOS>5"	B					
COC+	1.6	PT/A	LPOS>5"	B					
UAN	4	PT/A	LPOS>5"	B					
LSD (P=.05)					4.4	3.2	2.5	24.3	0
CV					81.86	84.19	51.6	20.76	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SWEET CORN- CALLISTO STAGE OF GROWTH STUDY

Trial ID: CALSTGRW 2002 Study Dir.: Dr. Douglas J. Doohan & T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	11	12	13	14	15
Weed Code					AMBEL	CIRAR	AGRASS	CIRAR	AGRASS
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					WEED	WEED	WEED	WEED	WEED
Rating Data Type					CONTROL	CONTROL	CONTROL	CONTROL	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/16/2002	7/16/2002	7/16/2002	8/2/2002	8/2/2002
UNTREATED CONTROL					0 c	0 d	0 d	0 e	0 e
WEED FREE CONTROL					98 a	97 a	96 a	98 a	99 a
CALLISTO+	3	OZ/A	EPOS 2"W	A	99 a	85 ab	86 bc	89 bcd	89 bcd
COC+	1.6	PT/A	EPOS 2"W	A					
UAN	4	PT/A	EPOS 2"W	A					
CALLISTO+	3	OZ/A	LPOS>5"	B	99 a	90 ab	87 bc	92 ab	89 cd
COC+	1.6	PT/A	LPOS>5"	B					
UAN	4	PT/A	LPOS>5"	B					
CALLISTO+	3	OZ/A	EPOS 2"W	A	99 a	87 ab	91 ab	91 abc	96 ab
ATRAZINE	1	PT/A	EPOS 2"W	A					
COC+	1.6	PT/A	EPOS 2"W	A					
UAN	4	PT/A	EPOS 2"W	A					
CALLISTO+	3	OZ/A	LPOS>5"	B	99 a	90 ab	92 ab	95 ab	93 a-d
ATRAZINE	1	PT/A	LPOS>5"	B					
COC+	1.6	PT/A	LPOS>5"	B					
UAN	4	PT/A	LPOS>5"	B					
CALLISTO+	1.5	OZ/A	EPOS 2"W	A	99 a	75 bc	89 abc	83 cd	90 bcd
COC+	1.6	PT/A	EPOS 2"W	A					
UAN	4	PT/A	EPOS 2"W	A					
CALLISTO+	1.5	OZ/A	LPOS>5"	B	90 b	76 bc	81 c	81 d	86 d
COC+	1.6	PT/A	LPOS>5"	B					
UAN	4	PT/A	LPOS>5"	B					
CALLISTO+	1.5	OZ/A	EPOS 2"W	A	99 a	61 c	97 a	89 bcd	96 ab
ATRAZINE	1	PT/A	EPOS 2"W	A					
COC+	1.6	PT/A	EPOS 2"W	A					
UAN	4	PT/A	EPOS 2"W	A					
CALLISTO+	1.5	OZ/A	LPOS>5"	B	99 a	90 ab	91 ab	91 abc	95 abc
ATRAZINE	1	PT/A	LPOS>5"	B					
COC+	1.6	PT/A	LPOS>5"	B					
UAN	4	PT/A	LPOS>5"	B					
LSD (P=.05)					5.2	18.8	8.5	9.3	7.2
CV					4.05	17.24	7.19	7.94	5.99

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SWEET CORN- CALLISTO STAGE OF GROWTH STUDY

Trial ID: CALSTGRW 2002 Study Dir.: Dr. Douglas J. Doohan & T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					CIRAR	AMBEL			
Crop Code					ZEAMS	ZEAMS	ZEAMS	ZEAMS	ZEAMS
Part Rated					WEED	WEED	PLANT	EAR	EAR
Rating Data Type					COUNTS	COUNTS	STAND CT.	MKTBL.NO.	MKTBL.WT
Rating Unit					PER PLOT	PER PLOT	PER 10'	PER 10'	LBS./A.
Rating Date					8/2/2002	8/2/2002	8/22/2002	8/22/2002	8/22/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	16	17	18	19	21
UNTREATED CONTROL					3 ab	5 a	11 abc	1 c	403.3 b
WEED FREE CONTROL					0 b	0 c	12 ab	4 ab	3245.9 a
CALLISTO+	3	OZ/A	EPOS 2"W	A	3 ab	0 c	11 abc	5 a	4023.8 a
COC+	1.6	PT/A	EPOS 2"W	A					
UAN	4	PT/A	EPOS 2"W	A					
CALLISTO+	3	OZ/A	LPOS>5"	B	1 ab	1 bc	12 abc	4 ab	2890.6 a
COC+	1.6	PT/A	LPOS>5"	B					
UAN	4	PT/A	LPOS>5"	B					
CALLISTO+	3	OZ/A	EPOS 2"W	A	3 ab	0 c	10 bc	4 ab	3716.5 a
ATRAZINE	1	PT/A	EPOS 2"W	A					
COC+	1.6	PT/A	EPOS 2"W	A					
UAN	4	PT/A	EPOS 2"W	A					
CALLISTO+	3	OZ/A	LPOS>5"	B	0 b	0 c	11 abc	5 a	4110.2 a
ATRAZINE	1	PT/A	LPOS>5"	B					
COC+	1.6	PT/A	LPOS>5"	B					
UAN	4	PT/A	LPOS>5"	B					
CALLISTO+	1.5	OZ/A	EPOS 2"W	A	2 ab	1 bc	10 c	3 ab	2496.9 ab
COC+	1.6	PT/A	EPOS 2"W	A					
UAN	4	PT/A	EPOS 2"W	A					
CALLISTO+	1.5	OZ/A	LPOS>5"	B	4 a	1 b	11 abc	3 bc	2448.9 ab
COC+	1.6	PT/A	LPOS>5"	B					
UAN	4	PT/A	LPOS>5"	B					
CALLISTO+	1.5	OZ/A	EPOS 2"W	A	4 a	0 c	13 a	4 ab	3245.9 a
ATRAZINE	1	PT/A	EPOS 2"W	A					
COC+	1.6	PT/A	EPOS 2"W	A					
UAN	4	PT/A	EPOS 2"W	A					
CALLISTO+	1.5	OZ/A	LPOS>5"	B	2 ab	0 c	10 abc	3 ab	2621.7 ab
ATRAZINE	1	PT/A	LPOS>5"	B					
COC+	1.6	PT/A	LPOS>5"	B					
UAN	4	PT/A	LPOS>5"	B					
LSD (P=.05)					3.5	1.2	2.4	2.4	2328.56
CV					116.91	109.37	15.53	47.17	54.95

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SWEET CORN- CALLISTO STAGE OF GROWTH STUDY

Trial ID: CALSTGRW 2002 Study Dir.: Dr. Douglas J. Doohan & T. Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code						
Crop Code					ZEAMS	ZEAMS
Part Rated					EAR	EAR
Rating Data Type					UNMKT.NO.	UNMKT.WT
Rating Unit					PER 10'	LBS./A.
Rating Date					8/22/2002	8/22/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	22	24
UNTREATED CONTROL					2 d	1584.6 d
WEED FREE CONTROL					5 ab	3658.9 a
CALLISTO+	3	OZ/A	EPOS 2"W	A	5 abc	2132 bcd
COC+	1.6	PT/A	EPOS 2"W	A		
UAN	4	PT/A	EPOS 2"W	A		
CALLISTO+	3	OZ/A	LPOS>5"	B	6 ab	3255.5 ab
COC+	1.6	PT/A	LPOS>5"	B		
UAN	4	PT/A	LPOS>5"	B		
CALLISTO+	3	OZ/A	EPOS 2"W	A	4 a-d	1872.7 cd
ATRAZINE	1	PT/A	EPOS 2"W	A		
COC+	1.6	PT/A	EPOS 2"W	A		
UAN	4	PT/A	EPOS 2"W	A		
CALLISTO+	3	OZ/A	LPOS>5"	B	4 bcd	2083.9 bcd
ATRAZINE	1	PT/A	LPOS>5"	B		
COC+	1.6	PT/A	LPOS>5"	B		
UAN	4	PT/A	LPOS>5"	B		
CALLISTO+	1.5	OZ/A	EPOS 2"W	A	2 cd	2026.3 bcd
COC+	1.6	PT/A	EPOS 2"W	A		
UAN	4	PT/A	EPOS 2"W	A		
CALLISTO+	1.5	OZ/A	LPOS>5"	B	4 bcd	2842.6 abc
COC+	1.6	PT/A	LPOS>5"	B		
UAN	4	PT/A	LPOS>5"	B		
CALLISTO+	1.5	OZ/A	EPOS 2"W	A	7 a	3245.9 ab
ATRAZINE	1	PT/A	EPOS 2"W	A		
COC+	1.6	PT/A	EPOS 2"W	A		
UAN	4	PT/A	EPOS 2"W	A		
CALLISTO+	1.5	OZ/A	LPOS>5"	B	4 bcd	2055.1 bcd
ATRAZINE	1	PT/A	LPOS>5"	B		
COC+	1.6	PT/A	LPOS>5"	B		
UAN	4	PT/A	LPOS>5"	B		
LSD (P=.05)					2.9	1256.36
CV					46.95	34.97

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

PERFORMANCE OF SANDEA ON TOMATOES

Trial ID: SANDEATOMW 2002 Study Dir.: Dr. Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

COOPERATOR/LANDOWNER

Cooperator: John Elliot, Farm Mgr.
Org: OARDC/OSU Phone No: (330)263-3940
Address 1: 1628 Dover Road
City: Wooster
State/Prov: Ohio
Postal Code: 44691

Conducted Under GLP (Y/N): N Conducted Under GEP (Y/N): N

Objective: To evaluate Sandea for injury on several varieties of processing tomatoes.

Crop 1: LYPES PROCESSING TOMATOES Variety: VARIOUS
Planting Date: 06/11/02 Planting Method: CONVENTIONAL
Rate: 12 IN. Depth: 2 IN
Row Spacing: 5 FT. Seed Bed: CONVENTIONAL

SITE AND DESIGN

Plot Width, Unit: 10 FT Plot Length, Unit: 40 FT Reps: 3
Site Type: level field
Tillage Type: conventional Study Design: RANDOMIZED COMPLETE BLOCK

MAINTENANCE

Field Prep./Maintenance: Plowed, disced late May. Broadcast fertilizer applied on June 5 (500# 10-20-20/A.), then disced in. Sencor DF @.33#/A., and Dual Magnum @ 1.33 pt./A., was applied preplant.Tomato transplants planted on June 11 with starter fertilizer (1lb. 10-52-8/50 gal. water). Asana @10 oz./A. and Dithane@2# /A. were applied throughout the summer at 7-10 day intervals.

SOIL DESCRIPTION

% Sand: 11 % OM: 3 Texture: SILT LOAM
% Silt: 75 pH: 6.0 Soil Name: WOOSTER SILT LOAM
% Clay: 14 CEC: 13 Fert. Level: MODERATE

APPLICATION DESCRIPTION

	A
Application Date:	6/21/2002
Time of Day:	8-9 AM
Application Method:	SPRAY
Application Timing:	POST
Applic. Placement:	BDCST.
Wind Velocity, Unit:	1 MPH

CROP STAGE AT EACH APPLICATION

	A
Crop 1 Code, Stage:	LYPES POST
Stage Scale:	VEGETATIV
Height, Unit:	10 IN.

APPLICATION EQUIPMENT

	A
Appl. Equipment:	CO2 BACKP
Operating Pressure:	35 PSI
Nozzle Type:	FLAT FAN
Nozzle Size:	8002VS
Nozzle Spacing, Unit:	12 IN.
Nozzles/Row:	4
Band Width, Unit:	48 IN.
Boom Height, Unit:	18 IN.
Ground Speed, Unit:	4 MPH
Carrier:	WATER
Spray Volume, Unit:	20 GPA

The Ohio State University

PERFORMANCE OF SANDEA ON TOMATOES

Trial ID: SANDEATOMW 2002 Study Dir.: Dr. Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Trial Comments

This trial targeted tomato injury, not weed control. Yield data based on two plants in plot center. We separated the fruit into marketable red, green and culls. We also took a 50 fruit subsample of the red marketable tomato category, (with weights in kilograms). Yield, (YLD) has been converted to pounds per acre.

The Ohio State University

PERFORMANCE OF SANDEA ON TOMATOES

Trial ID: SANDEATOMW 2002 Study Dir.: Dr. Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	1	2	3	4	5
Weed Code									
Crop Code					LYPES	LYPES	LYPES	LYPES	LYPES
Part Rated					PLANT	PLANT	PLANT	PLANT	PLANT
Rating Data Type					STUNT	LEAF BURN	LEAF CURL	CHLOROSIS	STUNT
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/25/2002	6/25/2002	6/25/2002	6/25/2002	7/3/2002
UNTREATED CONTROL	8245				0 c	0 c	0 b	0 d	0 f
UNTREATED CONTROL	7983				0 c	0 c	0 b	0 d	0 f
UNTREATED CONTROL	PS696				0 c	0 c	0 b	0 d	0 f
UNTREATED CONTROL	M82				0 c	0 c	0 b	0 d	0 f
UNTREATED CONTROL	9423				0 c	0 c	0 b	0 d	0 f
UNTREATED CONTROL	E6203				0 c	0 c	0 b	0 d	0 f
UNTREATED CONTROL	H722				0 c	0 c	0 b	0 d	0 f
SANDEA	8245	0.66 OZ/A	POST	A	0 c	3 bc	0 b	0 d	0 f
SANDEA	7983	0.66 OZ/A	POST	A	0 c	2 c	0 b	8 c	13 cde
SANDEA	PS696	0.66 OZ/A	POST	A	0 c	2 c	0 b	0 d	2 f
SANDEA	M82	0.66 OZ/A	POST	A	0 c	0 c	0 b	0 d	15 bcd
SANDEA	9423	0.66 OZ/A	POST	A	0 c	0 c	7 b	2 d	0 f
SANDEA	E6203	0.66 OZ/A	POST	A	3 bc	8 b	23 a	20 b	13 cde
SANDEA	H722	0.66 OZ/A	POST	A	0 c	2 c	3 b	0 d	7 c-f
SANDEA	8245	1.33 OZ/A	POST	A	0 c	2 c	0 b	0 d	3 ef
SANDEA	7983	1.33 OZ/A	POST	A	7 b	5 bc	0 b	18 b	25 ab
SANDEA	PS696	1.33 OZ/A	POST	A	0 c	0 c	0 b	0 d	0 f
SANDEA	M82	1.33 OZ/A	POST	A	0 c	2 c	0 b	0 d	17 bc
SANDEA	9423	1.33 OZ/A	POST	A	0 c	0 c	7 b	2 d	0 f
SANDEA	E6203	1.33 OZ/A	POST	A	27 a	22 a	33 a	27 a	28 a
SANDEA	H722	1.33 OZ/A	POST	A	0 c	0 c	0 b	3 cd	5 def
LSD (P=.05)					5.2	5	14	6.6	11.3
CV					180.39	137.42	243.5	104.45	111.76

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

PERFORMANCE OF SANDEA ON TOMATOES

Trial ID: SANDEATOMW 2002 Study Dir.: Dr. Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					LYPES	LYPES	LYPES	LYPES	LYPES
Part Rated					PLANT	PLANT	PLANT	PLANT	PLANT
Rating Data Type					LEAF BURN	LEAF CURL	CHLOROSIS	HEIGHTS	STUNT
Rating Unit					PERCENT	PERCENT	PERCENT	INCHES	PERCENT
Rating Date					7/3/2002	7/3/2002	7/3/2002	7/3/2002	7/16/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	6	7	8	9	10
UNTREATED CONTROL	8245				0 a	0 b	0 b	10.7 efg	0 e
UNTREATED CONTROL	7983				0 a	0 b	0 b	12.2 b-e	0 e
UNTREATED CONTROL	PS696				0 a	0 b	0 b	12.5 abc	0 e
UNTREATED CONTROL	M82				0 a	0 b	0 b	12.8 abc	0 e
UNTREATED CONTROL	9423				0 a	0 b	0 b	11.8 b-f	0 e
UNTREATED CONTROL	E6203				0 a	0 b	0 b	13 abc	0 e
UNTREATED CONTROL	H722				0 a	0 b	0 b	11.7 b-f	0 e
SANDEA 8245	0.66	OZ/A	POST	A	0 a	0 b	0 b	10.3 fg	5 de
SANDEA 7983	0.66	OZ/A	POST	A	0 a	0 b	0 b	11.5 c-f	0 e
SANDEA PS696	0.66	OZ/A	POST	A	0 a	0 b	0 b	12.3 bcd	0 e
SANDEA M82	0.66	OZ/A	POST	A	0 a	0 b	0 b	11.8 b-f	18 b
SANDEA 9423	0.66	OZ/A	POST	A	0 a	0 b	0 b	13.2 ab	0 e
SANDEA E6203	0.66	OZ/A	POST	A	0 a	0 b	0 b	9.8 gh	15 bc
SANDEA H722	0.66	OZ/A	POST	A	0 a	0 b	0 b	10.8 d-g	0 e
SANDEA 8245	1.33	OZ/A	POST	A	0 a	2 a	0 b	11.5 c-f	8 cde
SANDEA 7983	1.33	OZ/A	POST	A	0 a	0 b	0 b	12 b-e	0 e
SANDEA PS696	1.33	OZ/A	POST	A	0 a	0 b	0 b	13.2 ab	0 e
SANDEA M82	1.33	OZ/A	POST	A	0 a	0 b	0 b	9.8 gh	13 bcd
SANDEA 9423	1.33	OZ/A	POST	A	0 a	0 b	0 b	14 a	0 e
SANDEA E6203	1.33	OZ/A	POST	A	0 a	0 b	3 a	8.7 h	28 a
SANDEA H722	1.33	OZ/A	POST	A	0 a	0 b	0 b	12.8 abc	0 e
LSD (P=.05)					0	1	2.1	1.66	9.4
CV					0	793.73	793.73	8.58	134.99

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

PERFORMANCE OF SANDEA ON TOMATOES

Trial ID: SANDEATOMW 2002 Study Dir.: Dr. Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	11	12	13	14	15
Weed Code									
Crop Code					LYPES	LYPES	LYPES	LYPES	LYPES
Part Rated					PLANT	PLANT	PLANT	PLANT	PLANT
Rating Data Type					LEAF BURN	LEAF CURL	CHLOROSIS	STUNT	LEAF BURN
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/16/2002	7/16/2002	7/16/2002	7/31/2002	7/31/2002
UNTREATED CONTROL	8245				0 a	0 b	0 a	0 d	0 a
UNTREATED CONTROL	7983				0 a	0 b	0 a	0 d	0 a
UNTREATED CONTROL	PS696				0 a	0 b	0 a	0 d	0 a
UNTREATED CONTROL	M82				0 a	0 b	0 a	0 d	0 a
UNTREATED CONTROL	9423				0 a	0 b	0 a	0 d	0 a
UNTREATED CONTROL	E6203				0 a	0 b	0 a	0 d	0 a
UNTREATED CONTROL	H722				0 a	0 b	0 a	0 d	0 a
SANDEA	8245	0.66 OZ/A	POST	A	0 a	0 b	0 a	7 bcd	0 a
SANDEA	7983	0.66 OZ/A	POST	A	0 a	0 b	0 a	10 bcd	0 a
SANDEA	PS696	0.66 OZ/A	POST	A	0 a	0 b	0 a	5 bcd	0 a
SANDEA	M82	0.66 OZ/A	POST	A	0 a	0 b	0 a	10 bcd	0 a
SANDEA	9423	0.66 OZ/A	POST	A	0 a	0 b	0 a	2 cd	0 a
SANDEA	E6203	0.66 OZ/A	POST	A	0 a	5 a	0 a	13 abc	0 a
SANDEA	H722	0.66 OZ/A	POST	A	0 a	0 b	0 a	8 bcd	0 a
SANDEA	8245	1.33 OZ/A	POST	A	0 a	0 b	0 a	10 bcd	0 a
SANDEA	7983	1.33 OZ/A	POST	A	0 a	0 b	0 a	10 bcd	0 a
SANDEA	PS696	1.33 OZ/A	POST	A	0 a	0 b	0 a	8 bcd	0 a
SANDEA	M82	1.33 OZ/A	POST	A	0 a	0 b	0 a	15 ab	0 a
SANDEA	9423	1.33 OZ/A	POST	A	0 a	0 b	0 a	12 a-d	0 a
SANDEA	E6203	1.33 OZ/A	POST	A	0 a	5 a	0 a	23 a	0 a
SANDEA	H722	1.33 OZ/A	POST	A	0 a	0 b	0 a	8 bcd	0 a
LSD (P=.05)					0	3.6	0	12.7	0
CV					0	458.26	0	113.83	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

PERFORMANCE OF SANDEA ON TOMATOES

Trial ID: SANDEATOMW 2002 Study Dir.: Dr. Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code										
Crop Code					LYPES	LYPES	LYPES	LYPES	LYPES
Part Rated					PLANT	PLANT	FRUIT	FRUIT	FRUIT
Rating Data Type					LEAF CURL	CHLOROSIS	YLD.MKTBL	YLD.MKTBL.	YLD.GREEN
Rating Unit					PERCENT	PERCENT	KG./50	TONS/A.	TONS/A.
Rating Date					7/31/2002	7/31/2002	9/23/2002	9/23/2002	9/23/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	16	17	18	19	20
UNTREATED CONTROL 8245					0 a	0 a	2.3 ab	10.4 ab	0.8 d
UNTREATED CONTROL 7983					0 a	0 a	2.3 ab	12.7 ab	2 a-d
UNTREATED CONTROL PS696					0 a	0 a	2.2 ab	11.9 ab	2.6 a-d
UNTREATED CONTROL M82					0 a	0 a	2.2 ab	9.7 ab	2.8 a-d
UNTREATED CONTROL 9423					0 a	0 a	2.3 ab	14.9 a	3.9 a
UNTREATED CONTROL E6203					0 a	0 a	2.6 a	11 ab	2 a-d
UNTREATED CONTROL H722					0 a	0 a	2.6 a	13.6 ab	3.1 abc
SANDEA 8245	0.66	OZ/A	POST	A	0 a	0 a	2 ab	7.1 b	1 cd
SANDEA 7983	0.66	OZ/A	POST	A	0 a	0 a	2.2 ab	10.8 ab	1.7 bcd
SANDEA PS696	0.66	OZ/A	POST	A	0 a	0 a	2.1 ab	9.6 ab	1.5 bcd
SANDEA M82	0.66	OZ/A	POST	A	0 a	0 a	2.8 a	9.8 ab	2 a-d
SANDEA 9423	0.66	OZ/A	POST	A	0 a	0 a	2.2 ab	10.1 ab	2 a-d
SANDEA E6203	0.66	OZ/A	POST	A	0 a	0 a	2.5 ab	11.2 ab	2.9 a-d
SANDEA H722	0.66	OZ/A	POST	A	0 a	0 a	2.1 ab	8.7 ab	2 a-d
SANDEA 8245	1.33	OZ/A	POST	A	0 a	0 a	2.5 ab	12.4 ab	2.9 a-d
SANDEA 7983	1.33	OZ/A	POST	A	0 a	0 a	2.4 ab	9.6 ab	2.8 a-d
SANDEA PS696	1.33	OZ/A	POST	A	0 a	0 a	2.2 ab	9.6 ab	2.8 a-d
SANDEA M82	1.33	OZ/A	POST	A	0 a	0 a	2.3 ab	10.4 ab	3.3 ab
SANDEA 9423	1.33	OZ/A	POST	A	0 a	0 a	2.8 a	13.2 ab	2.7 a-d
SANDEA E6203	1.33	OZ/A	POST	A	0 a	0 a	2.8 a	9.2 ab	2.2 a-d
SANDEA H722	1.33	OZ/A	POST	A	0 a	0 a	1.8 b	7.9 b	0.9 d
LSD (P=.05)					0	0	0.74	6.9	2.13
CV					0	0	19.32	39.24	56.69

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

PERFORMANCE OF SANDEA ON TOMATOES

Trial ID: SANDEATOMW 2002 Study Dir.: Dr. Douglas J. Doohan and T.Koch
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code	
Crop Code	LYPES
Part Rated	FRUIT
Rating Data Type	YLD.CULL
Rating Unit	TONS/A.
Rating Date	9/23/2002

Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	21
UNTREATED CONTROL 8245					2.8 a
UNTREATED CONTROL 7983					3.9 a
UNTREATED CONTROL PS696					3.7 a
UNTREATED CONTROL M82					3 a
UNTREATED CONTROL 9423					2.6 a
UNTREATED CONTROL E6203					3.6 a
UNTREATED CONTROL H722					3 a
SANDEA 8245	0.66	OZ/A	POST	A	2 a
SANDEA 7983	0.66	OZ/A	POST	A	2 a
SANDEA PS696	0.66	OZ/A	POST	A	2.7 a
SANDEA M82	0.66	OZ/A	POST	A	4.5 a
SANDEA 9423	0.66	OZ/A	POST	A	2.1 a
SANDEA E6203	0.66	OZ/A	POST	A	3.1 a
SANDEA H722	0.66	OZ/A	POST	A	4.9 a
SANDEA 8245	1.33	OZ/A	POST	A	2.4 a
SANDEA 7983	1.33	OZ/A	POST	A	3.3 a
SANDEA PS696	1.33	OZ/A	POST	A	2.9 a
SANDEA M82	1.33	OZ/A	POST	A	4 a
SANDEA 9423	1.33	OZ/A	POST	A	2.9 a
SANDEA E6203	1.33	OZ/A	POST	A	3.8 a
SANDEA H722	1.33	OZ/A	POST	A	3.4 a
LSD (P=.05)					3.75
CV					71.81

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

HERBICIDE PROGRAMS FOR PROCESSING TOMATOES

Trial ID: HERPROCESTOM 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

COOPERATOR/LANDOWNER

Cooperator: Matt Hofelich Country: USA
Org: OARDC Veg. Crops Research Branch Phone No: 419-332-5142
Address 1: 1165 CR. 43,Fremont,Ohio 43420
City: Fremont
State/Prov: Ohio
Postal Code: 43420

Conducted Under GLP (Y/N): N Conducted Under GEP (Y/N): N

Objective: To evaluate herbicides for control of Eastern black nightshade and other broadleaf weeds in tomatoes.

CROP AND WEED DESCRIPTION

Weed	Code	Common Name	Scientific Name
1	CHEAL	common lambsquarter	Chenopodium album L.
2	SOLPT	Eastern black nightshade	Solanum ptycanthum Dun.
3	POROL	common purslane	Portulaca oleracea L.
4	ABUTH	velvetleaf	Abutilon theophrasti medicus
5	AMAXX	pigweed species	Amaranth spp.
6	AGRASS	annual grasses	spp.

Crop 1: LYPES PROCESSING TOMATO Variety: PETO 696
Planting Date: 05/31/02 Planting Method: CONVENTIONAL
Rate: 12 INCHES Depth: 2 "
Row Spacing: 5 FEET Seed Bed: CONVENTIONAL

SITE AND DESIGN

Plot Width, Unit: 10 FT Plot Length, Unit: 30 FT Reps: 4
Site Type: LEVEL FIELD
Tillage Type: CONVENTIONAL Study Design: RANDOMIZED COMPLETE BLOCK

MAINTENANCE

Field Prep./Maintenance:
11/18: chisel plowed
4/11: seeded tomatoes (Peto 696)
4/17: thinned tomatoes in flats
5/5: fertilized with 350#(0-0-60); 150#(18-46-0); 125#(46-0-0) per acre, and worked in with Danish tine.
5/6: staked out tomato beds and disk bedded.
5/22: power bedded
5/23: applied Dual Magnum & Treflan PPI treatments, & incorporated 1.5" with rotovator. knifed with subsoiler between beds
5/31: transplanted tomatoes; used .7 qt.of(10-34-0), and 6 oz. Diazinon AG 500/50 gal. water.
6/10: worked alleys with Danish tine
6/27: hoed plots as needed
7/3: hoed plots as needed
7/9: worked alleys with Danish tine
8/2: applied 5 oz./A. Quadris & 3 oz./A. Warrior
8/7: applied 5 oz./A Quadris, 1 pt./A. Champ 2, & 3 oz./A. Asana
8/17: applied 1.5 #/A. Maneb, 1 pt./A.Champ 2,.5 pts./A. Dimethoate, & .5#/A. Javelin
8/27: applied 3 pts./A. Bravo WS, 5 oz./A. Pounce
9/6: harvested tomato plots
10/8: deep subsoiled & chisel plowed under plots

SOIL DESCRIPTION

% Sand: 70 % OM: 3 Texture: FINE SANDY LOAM
% Silt: 20 pH: 5.8 Soil Name: COLWOOD
% Clay: 10 CEC: 7.6 Fert. Level: MODERATE

APPLICATION DESCRIPTION

	A	B	C
Application Date:	5/23/2002	6/3/2002	6/7/2002
Time of Day:	10-11 AM	11-12 AM	1-2 PM
Application Method:	SPRAY	SPRAY	SPRAY
Application Timing:	PPI	POST TP	POST
Applic. Placement:	BDCST	BDCST	BDCST
Air Temp., Unit:	52 F	67 F	60 F
Wind Velocity, Unit:	3 MPH	2 MPH	1 MPH
% Cloud Cover:	50	75	30

CROP STAGE AT EACH APPLICATION

	A	B	C
Crop 1 Code, Stage:	LYPES	LYPES	LYPES
Stage Scale:	PPT.INCOR	POST TPT.	POST
Height, Unit:	0 INCH	6 INCH	8 INCH

WEED STAGE AT EACH APPLICATION

	A	B	C
Weed 1 Code, Stage:	CHEAL PPI	CHEAL POST TRAN	CHEAL POST
Stage Scale:	.	COTY-2LF	< 1" TALL
Density, Unit:	. .	MED	MED
Weed 2 Code, Stage:	SOLPT PPI	SOLPT POST TRAN	SOLPT POST
Stage Scale:	.	COTY-2LF	<1" TALL
Density, Unit:	. .	MED	MED
Weed 3 Code, Stage:	POROL PPI	POROL POST TRAN	POROL POST
Stage Scale:	.	COTY-2LF	<1" TALL
Density, Unit:	. .	MED	MED
Weed 4 Code, Stage:	ABUTH PPI	ABUTH POST TRAN	ABUTH POST
Stage Scale:	.	COTY-2LF	< 1" TALL
Density, Unit:	. .	MED	MED
Weed 5 Code, Stage:	AMAXX PPI	AMAXX POST TRAN	AMAXX POST
Stage Scale:	.	COTY-2LF	<1" TALL
Density, Unit:	. .	MED	MED
Weed 6 Code, Stage:	AGRAS PPI	AGRAS POST TRAN	AGRAS POST
Stage Scale:	.	0-2 LF	< 1"TALL
Density, Unit:	. .	MED	MED
	PPI	POST TRAN	POST
Stage Scale:	.	COTY-2LF	< 1" TALL
Density, Unit:	. .	MED	MED

APPLICATION EQUIPMENT

	A	B	C
Appl. Equipment:	TRACTOR	CO2 BACKP	CO2 BACKP
Operating Pressure:	30 PSI	35 PSI	35 PSI
Nozzle Type:	FLAT FAN	FLAT FAN	FLAT FAN
Nozzle Size:	8002 VS	8002 VS	8002 VS
Nozzle Spacing, Unit:	12 IN	12 IN	12 IN
Nozzles/Row:	15	4	4
Band Width, Unit:	15 FT	60 IN	60 IN
Boom Height, Unit:	18 IN	18 IN	18 IN
Ground Speed, Unit:	3 MPH	4 MPH	4 MPH

The Ohio State University

HERBICIDE PROGRAMS FOR PROCESSING TOMATOES

Trial ID: HERPROCESTOM 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Trial Comments

The Fremont branch experienced severe drought conditions this summer, which may have affected experimental results.

Weed counts taken on 6/10, were the sum of two (50 x 50 cm.) quadrats worth of weeds, seperated into species. Yields were taken on a per plot basis, (2 rows x 25') , in pounds. A 50 fruit sample of marketable fruit was taken and was weighed in kilograms. Total weight of green and cull fruit are in pounds.

Weed ratings based on :("0%" =no control , to "100%" = complete weed control), of that species.

The Ohio State University

HERBICIDE PROGRAMS FOR PROCESSING TOMATOES

Trial ID: HERPROCESTOM 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					CHEAL	SOLPT	A.GRASS	ABUTH
Crop Code					LYPES	LYPES	LYPES	LYPES
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					COUNT	COUNT	COUNT	COUNT
Rating Unit					TOTAL #	TOTAL #	TOTAL #	TOTAL #
Rating Date					6/10/2002	6/10/2002	6/10/2002	6/10/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	1	2	3	4
HANDWEEDED CONTROL					0 b	0 b	0 c	0 c
WEEDY CONTROL					45 a	1 ab	87 a	0 bc
DUAL MAGNUM	1.33	PT/A	PPI	A	5 b	0 b	2 c	1 a
DUAL MAGNUM	1.33	PT/A	P.TP.DIR	B	19 b	3 a	28 bc	1 ab
DUAL MAGNUM	1.33	PT/A	P.TP.BR.	B	24 ab	0 b	45 b	1 abc
DUAL MAGNUM+	1.33	PT/A	P.TP.DIR	B	0 b	0 b	0 c	0 c
SENCOR	0.75	LB/A	P.TP.DIR	B				
DUAL MAGNUM	1.33	PT/A	PPI	A	1 b	0 b	2 c	0 c
MATRIX	1	OZ/A	POST	C				
SENCOR	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	1 b	0 b	0 c	0 bc
MATRIX +	2	OZ/A	POST	C				
SENCOR +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	1 b	0 b	0 c	0 bc
MATRIX +	3	OZ/A	POST	C				
SENCOR +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
MATRIX +	2	OZ/A	POST	C	3 b	0 b	16 bc	0 c
SENCOR +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	7 b	0 b	2 c	0 c
MATRIX +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	14 b	0 b	3 c	1 abc
SANDEA+	0.66	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
TREFLAN	1.5	PT/A	PPI	A	10 b	1 ab	4 c	0 c
SANDEA+	0.66	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
LSD (P=.05)					24.1	2.2	37.7	0.9
CV					170.76	339.12	182.13	194.38

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

HERBICIDE PROGRAMS FOR PROCESSING TOMATOES

Trial ID: HERPROCESTOM 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					POLPY	AMAXX	POROL	
Crop Code					LYPES	LYPES	LYPES	LYPES
Part Rated					WEED	WEED	WEED	PLANT
Rating Data Type					COUNT	COUNT	COUNT	INJURY
Rating Unit					TOTAL #	TOTAL #	TOTAL #	PERCENT
Rating Date					6/10/2002	6/10/2002	6/10/2002	6/17/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	5	6	7	8
HANDWEEDED CONTROL					0 b	0 b	0 b	0 a
WEEDY CONTROL					3 a	3 a	31 a	0 a
DUAL MAGNUM	1.33	PT/A	PPI	A	0 b	0 b	2 b	0 a
DUAL MAGNUM	1.33	PT/A	P.TP.DIR	B	1 ab	1 b	2 b	0 a
DUAL MAGNUM	1.33	PT/A	P.TP.BR.	B	2 ab	1 b	3 b	0 a
DUAL MAGNUM+	1.33	PT/A	P.TP.DIR	B	0 b	0 b	0 b	0 a
SENCOR	0.75	LB/A	P.TP.DIR	B				
DUAL MAGNUM	1.33	PT/A	PPI	A	0 b	0 b	0 b	0 a
MATRIX	1	OZ/A	POST	C				
SENCOR	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	0 b	0 b	0 b	0 a
MATRIX +	2	OZ/A	POST	C				
SENCOR +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	0 b	0 b	0 b	0 a
MATRIX +	3	OZ/A	POST	C				
SENCOR +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
MATRIX +	2	OZ/A	POST	C	0 b	1 b	0 b	0 a
SENCOR +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	0 b	0 b	0 b	0 a
MATRIX +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	0 b	0 b	0 b	0 a
SANDEA+	0.66	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
TREFLAN	1.5	PT/A	PPI	A	1 ab	0 b	0 b	0 a
SANDEA+	0.66	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
LSD (P=.05)					2	1.5	9.3	0
CV					279.19	309.02	221.34	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

HERBICIDE PROGRAMS FOR PROCESSING TOMATOES

Trial ID: HERPROCESTOM 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					CHEAL	SOLPT	A.GRASS	ABUTH
Crop Code					LYPES	LYPES	LYPES	LYPES
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					CONTROL	CONTROL	CONTROL	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/17/2002	6/17/2002	6/17/2002	6/17/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	9	10	11	12
HANDWEEDED CONTROL					99 a	99 a	99 a	99 a
WEEDY CONTROL					0 d	0 c	0 d	0 d
DUAL MAGNUM	1.33	PT/A	PPI	A	71 bc	99 a	99 a	64 b
DUAL MAGNUM	1.33	PT/A	P.TP.DIR	B	55 c	92 a	70 c	23 c
DUAL MAGNUM	1.33	PT/A	P.TP.BR.	B	68 bc	99 a	99 a	19 cd
DUAL MAGNUM+	1.33	PT/A	P.TP.DIR	B	99 a	99 a	99 a	99 a
SENCOR	0.75	LB/A	P.TP.DIR	B				
DUAL MAGNUM	1.33	PT/A	PPI	A	99 a	99 a	99 a	99 a
MATRIX	1	OZ/A	POST	C				
SENCOR	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	73 abc	98 a	99 a	99 a
MATRIX +	2	OZ/A	POST	C				
SENCOR +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	73 abc	99 a	99 a	99 a
MATRIX +	3	OZ/A	POST	C				
SENCOR +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
MATRIX +	2	OZ/A	POST	C	79 abc	35 b	99 a	99 a
SENCOR +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	85 ab	91 a	91 b	91 a
MATRIX +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	78 abc	99 a	99 a	99 a
SANDEA+	0.66	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
TREFLAN	1.5	PT/A	PPI	A	70 bc	99 a	99 a	99 a
SANDEA+	0.66	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
LSD (P=.05)					27.2	8.3	2.3	20.5
CV					26.04	6.79	1.83	18.87

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

HERBICIDE PROGRAMS FOR PROCESSING TOMATOES

Trial ID: HERPROCESTOM 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					POLPY	AMAXX	CHEAL	POROL
Crop Code					LYPES	LYPES	LYPES	LYPES
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					CONTROL	CONTROL	CONTROL	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/17/2002	6/26/2002	6/26/2002	6/26/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	13	14	15	16
HANDWEEDED CONTROL					99 a	0 a	99 a	99 a
WEEDY CONTROL					0 d	0 a	0 d	0 f
DUAL MAGNUM	1.33	PT/A	PPI	A	96 a	0 a	73 ab	83 bcd
DUAL MAGNUM	1.33	PT/A	P.TP.DIR	B	70 c	0 a	39 c	74 de
DUAL MAGNUM	1.33	PT/A	P.TP.BR.	B	99 a	0 a	36 c	82 cd
DUAL MAGNUM+	1.33	PT/A	P.TP.DIR	B	99 a	0 a	99 a	99 a
SENCOR	0.75	LB/A	P.TP.DIR	B				
DUAL MAGNUM	1.33	PT/A	PPI	A	99 a	0 a	68 b	91 abc
MATRIX	1	OZ/A	POST	C				
SENCOR	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	99 a	0 a	94 ab	95 a
MATRIX +	2	OZ/A	POST	C				
SENCOR +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	99 a	0 a	90 ab	95 ab
MATRIX +	3	OZ/A	POST	C				
SENCOR +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
MATRIX +	2	OZ/A	POST	C	99 a	0 a	76 ab	79 d
SENCOR +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	91 b	0 a	90 ab	96 a
MATRIX +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	99 a	0 a	81 ab	80 cd
SANDEA+	0.66	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
TREFLAN	1.5	PT/A	PPI	A	99 a	0 a	84 ab	66 e
SANDEA+	0.66	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
LSD (P=.05)					3.7	0	26.8	12.2
CV					2.97	0	26.24	10.73

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

HERBICIDE PROGRAMS FOR PROCESSING TOMATOES

Trial ID: HERPROCESTOM 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					ABUTH	A.GRASS	AMAXX	POLPY
Crop Code					LYPES	LYPES	LYPES	LYPES
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					CONTROL	CONTROL	CONTROL	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/26/2002	6/26/2002	6/26/2002	6/26/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	17	18	19	20
HANDWEEDED CONTROL					99 a	99 a	99 a	99 a
WEEDY CONTROL					0 c	0 f	0 c	0 d
DUAL MAGNUM	1.33	PT/A	PPI	A	42 b	91 cde	99 a	92 bc
DUAL MAGNUM	1.33	PT/A	P.TP.DIR	B	30 bc	90 de	96 a	89 c
DUAL MAGNUM	1.33	PT/A	P.TP.BR.	B	27 bc	97 ab	98 a	91 bc
DUAL MAGNUM+	1.33	PT/A	P.TP.DIR	B	99 a	99 a	99 a	99 a
SENCOR	0.75	LB/A	P.TP.DIR	B				
DUAL MAGNUM	1.33	PT/A	PPI	A	97 a	96 abc	93 a	99 a
MATRIX	1	OZ/A	POST	C				
SENCOR	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	97 a	96 a-d	99 a	99 a
MATRIX +	2	OZ/A	POST	C				
SENCOR +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	96 a	96 abc	98 a	99 a
MATRIX +	3	OZ/A	POST	C				
SENCOR +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
MATRIX +	2	OZ/A	POST	C	99 a	96 a-d	81 b	99 a
SENCOR +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	96 a	95 a-d	99 a	99 a
MATRIX +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	99 a	92 bcd	93 a	99 a
SANDEA+	0.66	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
TREFLAN	1.5	PT/A	PPI	A	99 a	86 e	99 a	96 ab
SANDEA+	0.66	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
LSD (P=.05)					31.1	5.9	9.2	6.6
CV					28.9	4.7	7.27	5.22

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

HERBICIDE PROGRAMS FOR PROCESSING TOMATOES

Trial ID: HERPROCESTOM 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					SOLPT		CHEAL	SOLPT
Crop Code					LYPES	LYPES	LYPES	LYPES
Part Rated					WEED	PLANT	WEED	WEED
Rating Data Type					CONTROL	INJURY	CONTROL	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/26/2002	7/1/2002	7/1/2002	7/1/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	21	22	23	24
HANDWEEDED CONTROL					99 a	0 a	99 a	99 a
WEEDY CONTROL					0 c	0 a	0 g	0 e
DUAL MAGNUM	1.33	PT/A	PPI	A	99 a	0 a	43 def	99 a
DUAL MAGNUM	1.33	PT/A	P.TP.DIR	B	99 a	0 a	20 fg	99 a
DUAL MAGNUM	1.33	PT/A	P.TP.BR.	B	99 a	0 a	35 ef	99 a
DUAL MAGNUM+	1.33	PT/A	P.TP.DIR	B	99 a	0 a	93 a	96 ab
SENCOR	0.75	LB/A	P.TP.DIR	B				
DUAL MAGNUM	1.33	PT/A	PPI	A	93 a	0 a	91 a	96 ab
MATRIX	1	OZ/A	POST	C				
SENCOR	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	97 a	0 a	88 ab	96 ab
MATRIX +	2	OZ/A	POST	C				
SENCOR +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	97 a	0 a	80 abc	91 b
MATRIX +	3	OZ/A	POST	C				
SENCOR +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
MATRIX +	2	OZ/A	POST	C	54 b	0 a	58 cde	10 d
SENCOR +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	93 a	0 a	76 abc	68 c
MATRIX +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	83 a	0 a	64 cd	99 a
SANDEA+	0.66	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
TREFLAN	1.5	PT/A	PPI	A	94 a	0 a	65 bcd	92 b
SANDEA+	0.66	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
LSD (P=.05)					21.3	0	22.8	6.9
CV					17.54	0	25.61	6.03

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

HERBICIDE PROGRAMS FOR PROCESSING TOMATOES

Trial ID: HERPROCESTOM 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					A.GRASS	ABUTH	AMAXX	POROL
Crop Code					LYPES	LYPES	LYPES	LYPES
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					CONTROL	CONTROL	CONTROL	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/1/2002	7/1/2002	7/1/2002	7/1/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	25	26	27	28
HANDWEEDED CONTROL					99 a	99 a	99 a	92 a
WEEDY CONTROL					0 e	0 d	0 c	0 f
DUAL MAGNUM	1.33	PT/A	PPI	A	92 bc	45 c	97 a	59 cd
DUAL MAGNUM	1.33	PT/A	P.TP.DIR	B	88 cd	67 bc	99 a	25 e
DUAL MAGNUM	1.33	PT/A	P.TP.BR.	B	96 ab	72 abc	99 a	66 bc
DUAL MAGNUM+	1.33	PT/A	P.TP.DIR	B	96 ab	96 ab	96 a	93 a
SENCOR	0.75	LB/A	P.TP.DIR	B				
DUAL MAGNUM	1.33	PT/A	PPI	A	95 ab	99 a	96 a	90 a
MATRIX	1	OZ/A	POST	C				
SENCOR	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	94 abc	96 ab	99 a	90 a
MATRIX +	2	OZ/A	POST	C				
SENCOR +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	91 bc	96 ab	99 a	91 a
MATRIX +	3	OZ/A	POST	C				
SENCOR +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
MATRIX +	2	OZ/A	POST	C	96 ab	99 a	39 b	45 d
SENCOR +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	94 abc	96 ab	97 a	81 ab
MATRIX +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	96 ab	99 a	99 a	23 e
SANDEA+	0.66	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
TREFLAN	1.5	PT/A	PPI	A	84 d	99 a	99 a	40 de
SANDEA+	0.66	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
LSD (P=.05)					6.1	29.7	11.1	19.7
CV					4.98	25.42	9.06	22.56

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

HERBICIDE PROGRAMS FOR PROCESSING TOMATOES

Trial ID: HERPROCESTOM 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					CHEAL	A.GRASS	SOLPT	POLPY
Crop Code					LYPES	LYPES	LYPES	LYPES
Part Rated					WEED	WEED	WEED	WEED
Rating Data Type					CONTROL	CONTROL	CONTROL	CONTROL
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					8/2/2002	8/2/2002	8/2/2002	8/2/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	29	30	31	32
HANDWEEDED CONTROL					99 a	99 a	99 a	99 a
WEEDY CONTROL					0 f	0 d	0 f	0 c
DUAL MAGNUM	1.33	PT/A	PPI	A	4 f	65 bc	26 ef	58 b
DUAL MAGNUM	1.33	PT/A	P.TP.DIR	B	4 f	73 abc	74 a-d	63 b
DUAL MAGNUM	1.33	PT/A	P.TP.BR.	B	25 ef	25 d	50 cde	81 ab
DUAL MAGNUM+	1.33	PT/A	P.TP.DIR	B	90 a	85 abc	95 ab	99 a
SENCOR	0.75	LB/A	P.TP.DIR	B				
DUAL MAGNUM	1.33	PT/A	PPI	A	74 abc	60 c	89 ab	99 a
MATRIX	1	OZ/A	POST	C				
SENCOR	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	85 ab	94 ab	93 ab	98 a
MATRIX +	2	OZ/A	POST	C				
SENCOR +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	73 abc	76 abc	60 b-e	98 a
MATRIX +	3	OZ/A	POST	C				
SENCOR +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
MATRIX +	2	OZ/A	POST	C	24 ef	75 abc	39 de	99 a
SENCOR +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	61 bcd	89 abc	83 abc	99 a
MATRIX +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	56 cd	64 bc	87 ab	96 a
SANDEA+	0.66	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
TREFLAN	1.5	PT/A	PPI	A	45 de	81 abc	84 abc	96 a
SANDEA+	0.66	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
LSD (P=.05)					27.3	33	35.7	24.3
CV					38.95	33.98	36.95	20.43

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

HERBICIDE PROGRAMS FOR PROCESSING TOMATOES

Trial ID: HERPROCESTOM 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					POROL	ABUTH	AMAXX	
Crop Code					LYPES	LYPES	LYPES	LYPES
Part Rated					WEED	WEED	WEED	YIELD
Rating Data Type					CONTROL	CONTROL	CONTROL	TOTAL MKTB.
Rating Unit					PERCENT	PERCENT	PERCENT	TONS/A.
Rating Date					8/2/2002	8/2/2002	8/2/2002	9/6/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	33	34	35	37
HANDWEEDED CONTROL					99 a	99 a	99 a	12.4 bc
WEEDY CONTROL					0 f	0 c	0 c	2.9 fg
DUAL MAGNUM	1.33	PT/A	PPI	A	48 e	51 b	96 a	4.9 ef
DUAL MAGNUM	1.33	PT/A	P.TP.DIR	B	53 e	55 b	94 a	0.7 g
DUAL MAGNUM	1.33	PT/A	P.TP.BR.	B	80 a-d	51 b	92 a	1.4 g
DUAL MAGNUM+	1.33	PT/A	P.TP.DIR	B	98 a	62 ab	92 a	17 a
SENCOR	0.75	LB/A	P.TP.DIR	B				
DUAL MAGNUM	1.33	PT/A	PPI	A	63 cde	99 a	85 a	15 ab
MATRIX	1	OZ/A	POST	C				
SENCOR	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	81 abc	70 ab	98 a	14.7 ab
MATRIX +	2	OZ/A	POST	C				
SENCOR +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	86 ab	95 a	98 a	17.1 a
MATRIX +	3	OZ/A	POST	C				
SENCOR +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
MATRIX +	2	OZ/A	POST	C	78 a-d	99 a	35 b	7.6 de
SENCOR +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	83 abc	84 ab	97 a	12.3 bc
MATRIX +	2	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
DUAL MAGNUM	1.33	PT/A	PPI	A	58 de	96 a	99 a	10.2 cd
SANDEA+	0.66	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
TREFLAN	1.5	PT/A	PPI	A	70 b-e	65 ab	99 a	9.8 cd
SANDEA+	0.66	OZ/A	POST	C				
NIS	0.4	PT/A	POST	C				
LSD (P=.05)					22.8	37.6	17.8	3.15
CV					23.2	37.07	14.92	22.78

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

HERBICIDE PROGRAMS FOR PROCESSING TOMATOES

Trial ID: HERPROCESTOM 2002 Study Dir.: Dr. Douglas J. Doohan and T. Koch
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code Crop Code Part Rated Rating Data Type Rating Unit Rating Date					LYPES YIELD 50 MKTB.FRU KILOGRAM 9/6/2002	LYPES YIELD TOTAL GREEN TONS/A. 9/6/2002	LYPES YIELD TOTAL CULL TONS/A. 9/6/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	38	40	42
HANDWEEDED CONTROL					3.1 bcd	1.6 cde	1 ab
WEEDY CONTROL					2.3 fg	0.2 gh	0.4 c
DUAL MAGNUM	1.33	PT/A	PPI	A	2.4 f	0.4 fgh	1.2 a
DUAL MAGNUM	1.33	PT/A	P.TP.DIR	B	1.9 g	0.1 h	0.4 c
DUAL MAGNUM	1.33	PT/A	P.TP.BR.	B	2.2 fg	0.1 h	0.4 c
DUAL MAGNUM+	1.33	PT/A	P.TP.DIR	B	3.5 ab	4.1 a	0.8 abc
SENCOR	0.75	LB/A	P.TP.DIR	B			
DUAL MAGNUM	1.33	PT/A	PPI	A	3.2 a-d	2.3 bcd	1 ab
MATRIX	1	OZ/A	POST	C			
SENCOR	2	OZ/A	POST	C			
NIS	0.4	PT/A	POST	C			
DUAL MAGNUM	1.33	PT/A	PPI	A	3.3 abc	3.3 ab	0.9 ab
MATRIX +	2	OZ/A	POST	C			
SENCOR +	2	OZ/A	POST	C			
NIS	0.4	PT/A	POST	C			
DUAL MAGNUM	1.33	PT/A	PPI	A	3.5 a	2.5 bc	0.8 abc
MATRIX +	3	OZ/A	POST	C			
SENCOR +	2	OZ/A	POST	C			
NIS	0.4	PT/A	POST	C			
MATRIX +	2	OZ/A	POST	C	2.6 ef	1.3 def	1.2 a
SENCOR +	2	OZ/A	POST	C			
NIS	0.4	PT/A	POST	C			
DUAL MAGNUM	1.33	PT/A	PPI	A	3 cde	1.2 efg	1.2 a
MATRIX +	2	OZ/A	POST	C			
NIS	0.4	PT/A	POST	C			
DUAL MAGNUM	1.33	PT/A	PPI	A	2.9 de	1.7 cde	0.7 bc
SANDEA+	0.66	OZ/A	POST	C			
NIS	0.4	PT/A	POST	C			
TREFLAN	1.5	PT/A	PPI	A	2.8 de	1.2 d-g	0.7 bc
SANDEA+	0.66	OZ/A	POST	C			
NIS	0.4	PT/A	POST	C			
LSD (P=.05)					0.42	1.09	0.48
CV					10.4	49.35	40.77

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

COOPERATOR/LANDOWNER

Cooperator: Matt Hofelich
Org: OARDC Veg.Crops Research Branch Phone No: 419-332-5142
Address 1: 1165 CR 43
City: Fremont
State/Prov: Ohio
Postal Code: 43420

Conducted Under GLP (Y/N): N Conducted Under GEP (Y/N): N

Objective: To evaluate sensitivity of vegetable crops to soil residues of "Balance" herbicide applied PRE the previous year.

Crop 1: PHSVN BEAN, SNAP Variety: STRIKE/HIALEAH
Planting Date: 05/30/02 Planting Method: CONVENTIONAL
Rate: 80 LB./A. Depth: 1 IN
Row Spacing: 3 FT. Seed Bed: CONVENTIONAL

Crop 2: LYPES PROCESSING TOMATO Variety: PETO 696/HEINZ 9437
Planting Date: 05/28/02 Planting Method: CONVENTIONAL
Rate: 12 IN. in row Depth: 2 IN
Row Spacing: 6 FT. Seed Bed: CONVENTIONAL

Crop 3: CPSAN PEPPER Variety: ARISTOTLE/PALADIN
Planting Date: 05/28/02 Planting Method: CONVENTIONAL
Rate: 12 IN.in row Depth: 2 IN
Row Spacing: 36 IN. Seed Bed: CONVENTIONAL

Crop 4: BRSOL CABBAGE Variety: RED DYNASTY/HURON
Planting Date: 05/29/02 Planting Method: CONVENTIONAL
Rate: 10 IN.in row
Row Spacing: 3 ft. Seed Bed: CONVENTIONAL

Crop 5: DAUCS CARROT Variety: S.NANTES/DANVERS 126
Planting Date: 05/30/02 Planting Method: CONVENTIONAL
Rate: 3 LBS./A. Depth: 0.5 IN
Row Spacing: 2.5 FT. Seed Bed: CONVENTIONAL

Crop 6: CUMSA CUCUMBER Variety: VLASSET
Planting Date: 06/14/02 Planting Method: CONVENTIONAL
Rate: 2 SEEDS/9" Depth: 1 IN
Row Spacing: 4 FT. Seed Bed: CONVENTIONAL

SITE AND DESIGN

Plot Width, Unit: 15 FT Plot Length, Unit: 50 FT Reps: 4
Site Type: LEVEL FIELD
Tillage Type: CONVENTIONAL Study Design: RANDOMIZED COMPLETE BLOCK

Trial Initiation Comments: In 2002, plots were established across 2001 plots.

MAINTENANCE

Field Prep./Maintenance: Log of field operations:

11/12/01: Disked 2-3 inches deep with Oliver 12' disk and Ford 4610
4/10/02: Seeded 8 flats peppers, 6 flats tomato, 4 flats cabbage
4/15/02: Reseeded 4 flats of Huron for trial
4/17/02: Thinning of 18 flats
5/5/02: Country Springs applied with 1603 Airflow 350#/@ 0-0-60, 150#/@ 18-46-0, 125#/@ 46-0-0
5/5/02: Worked with Danish tine and 6310
5/23/02: Sprayed plot with 1 qt / @ Roundup Ultra Max with Tappan sprayer and IH 140
5/28/02: Sprayed tomato, pepper, bean and cabbage plots with 1 pt/@ Dual Mag.Planted 2 pepper, and 2 tomato varieties, used .7qt/ of 10-34-0 and 6 oz Diazinon AG 500/50 gal.H2O.
5/29/02: Planted 2 cabbage varieties used .7qt/ of 10-34-0 and 6 oz Diazinon AG 500 / 50 gal H2O
5/30/02: Planted 2 carrot varieties used Planter Jr, staked out plot locations with Tim & Josh. Sprayed 6.4 oz/@ of Ambush with Tappan sprayer and IH 140 for cutworm & fleabeetle
6/10/02: Worked Alleys with Danish tine and JD 6310
6/13/02: Cultivated tomatoes, peppers, cabbage and beans with AC "G". Hoed and weeded tomatoes, peppers, cabbage, and beans
6/14/02: Planted 1 row of pickles into plot
6/18/02: Replanted carrot rows in plot
6/26/02: Thinned pickles
6/27/02: Applied .7qt / acre Thiodan for beetle
7/8/02: Hoed & Weeded;cultivated with AC "G"
7/9/02: Worked Alleys with Danish tine and JD 6310
7/11/02: Re-hoed and weeded following rain
7/12/02: Sprayed with 1.5 pts/@ Bravo WS, 1.3 pts/@ Champ II, 0.67 pts/@ Thiodan
7/16/02: Sprayed with 1.5 pts/@ Bravo WS, 0.67 pts/@ Thiodan
7/19/02: Applied 1 pt/@ Bravo WS, 4 oz./@ Asana, .5 pts/@ Dimethoate 4EC;set up irrigation, Irrigated with 1 1/2 inch of water, broke down irrigation
7/22/02: 1st harvest snap beans and peppers
7/30/02: Harvested & evaluated pickles
8/2/02: Applied 5 oz./@ Quadris, 3oz./@ Warrior
8/5/02: Harvested & evaluated pickles;
8/5/02: 2nd harvest snap beans
8/6/02: Hoed & Weeded
8/8/02: Applied 1.5 lbs/@ Maneb 75DF, 1 pt/@ Champ II,2lbs/@ Ridomil Gold/Bravo, 1 1/2 pt/@ Champ II, 4 oz./@ Pounce 3.2EC, harvested & evaluated pickles.
8/12/02: Harvested & evaluated pickles, harvested snap beans (3rd); 2nd harvest peppers
8/16/02: Harvested & evaluated pickles
8/19/02: Harvested & evaluated pickles
8/22/02: Harvested & evaluated pickles;applied 5oz.@ Quadris, 1 pt/@ Champ II, 3 oz/@ Asana
8/26/02: Harvested & evaluated pickles
8/27/02: Harvested Balance tomatoes
9/4/02: 3rd harvest pepper
9/6/02: Applied 5 oz./@ Quadris, 3oz./@ Pounce 3.2EC
9/10/02: Harvested Red Dynasty cabbage varriety from plot
9/13/02: Applied 2.5 pts / @ Bravo WS, 1 pt /@ Champ II, 4 oz. /@ Asana
9/26/02: Applied 1.5 qts /@ Manex, 6 oz./@ Pounce, 0.67 pts /@ Dimethoate
10/4/02: Harvested and evaluated Huron cabbage variety from trial
10/8/02: Deep subsoiled and chisel plowed under plot

SOIL DESCRIPTION

% Sand: 70	% OM: 3	Texture: FINE SANDY LOAM
% Silt: 20	pH: 5.8	Soil Name: COLWOOD
% Clay: 10	CEC: 7.6	Fert. Level: MODERATE

APPLICATION DESCRIPTION

	A
Application Date:	5/24/2001
Time of Day:	11-12AM
Application Method:	SPRAY
Application Timing:	PREEM
Applic. Placement:	BDCST
Air Temp., Unit:	12.8 C
% Relative Humidity:	94
Wind Velocity, Unit:	2 MPH
Dew Presence (Y/N):	N
Water Hardness:	SOFT
Soil Moisture:	MOIST
% Cloud Cover:	70

CROP STAGE AT EACH APPLICATION

	A
Crop 1 Code, Stage:	PHSVN
Crop 2 Code, Stage:	LYPES
Crop 3 Code, Stage:	CPSAN
Crop 4 Code, Stage:	BRSOL
Crop 5 Code, Stage:	DAUCS

APPLICATION EQUIPMENT

	A
Appl. Equipment:	CUSTOM
Operating Pressure:	30 PSI
Nozzle Type:	FLAT FAN
Nozzle Size:	8002VS
Nozzle Spacing, Unit:	12 IN.
Band Width, Unit:	10 FT.
Boom Height, Unit:	18 IN.
Ground Speed, Unit:	3 MPH
Carrier:	H20
Spray Volume, Unit:	25 GPA

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Trial Comments

For the 2002 Balance carryover trial in Fremont, we planted six main crops, with two varieties per crop. Cucumbers had only one variety. We had poor carrot germination in general, resulting in crop failure for both varieties. They were:

CROP	VARIETY
1) Snap bean:	Strike & Hialeah
2) Tomato:	Heinz 9436 & Peto 696
3) Pepper:	Paladin & Aristotle
4) Cabbage:	Red Dynasty & Huron
5) Carrot:	Scarlet Nantes & Danvers 126
6) Cucumber:	Vlasset

Under "PART RATED" in the data section, the specfic crop cultivar is given first, followed by one of the following letter codes:
P= PLANT; F= FRUIT; R= ROOT; H= HEAD.

Snap beans, cucumbers, and carrots were direct-seeded on May 24. Transplants were used with the remaining crops on June 3. The crops were observed regularly, and were rated for chlorosis (yellowing), stunting, and total injury.Visual ratings were taken on a percentage basis, where ("0" = no injury, and "100" = plant death). There was no visual injury to any of the crops prior to June 25. Plant counts and yields were based on four linear feet of row. Plot yields were taken in kilograms, and have been converted to tons per acre. The cultivar names are listed in the data section heading under "PART RATED"; the complete names are listed above. Below are abbreviations found in the data and an explanation for them:
COUNT= number of plants in four linear feet of row.
CULL NO.= cull number, (cull being diseased, inferior quality, or otherwise non-marketable)
CULL WT.= cull weight
MSSHAPE. NO. = Misshapen number
MSSHAPE. WT.= misshapen weight
MKTB. NO.= marketable number
MKTB. WT.= marketable weight
50 FRT. WT. = weight of 50 marketable fruit (tomatoes)
For carrots, "marketables" were six or more inches in length; for cucumbers, all fruits that are thumb size to 2" diameter; for cabbage, 4" or greater head diameter

The Fremont Branch experienced a severe drought this summer which affected crop growth and yield.

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					PHSVN	PHSVN	PHSVN	PHSVN	PHSVN
Part Rated					STRIKE P	STRIKE P	STRIKE P	HIALEA P	HIALEA P
Rating Data Type					INJURY	CHLOROSIS	STUNT	INJURY	CHLOROSIS
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/10/2002	6/10/2002	6/10/2002	6/10/2002	6/10/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	1	2	3	4	5
UNTREATED CONTROL					0 c	0 b	0 a	0 d	0 c
BALANCE	1.5	OZ/A	PREEM	A	0 c	0 b	0 a	1 cd	1 bc
BALANCE	2	OZ/A	PREEM	A	1 bc	0 b	1 a	2 c	1 bc
BALANCE	3	OZ/A	PREEM	A	2 ab	2 ab	1 a	3 b	2 b
BALANCE	6	OZ/A	PREEM	A	4 a	3 a	1 a	5 a	5 a
LSD (P=.05)					1.9	1.8	1.7	1.5	1.5
CV					96.03	123.06	197.09	46.28	56.42

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					PHSVN	BRSOL	BRSOL	BRSOL	BRSOL
Part Rated					HIALEA P	HURON P	HURON P	HURON P	R.DYNA P
Rating Data Type					STUNT	INJURY	CHLOROSIS	STUNT	INJURY
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/10/2002	6/10/2002	6/10/2002	6/10/2002	6/10/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	6	7	8	9	10
UNTREATED CONTROL					0 a	0 b	0 a	0 b	0 b
BALANCE	1.5	OZ/A	PREEM	A	0 a	0 b	0 a	0 b	1 ab
BALANCE	2	OZ/A	PREEM	A	1 a	0 b	0 a	0 b	1 ab
BALANCE	3	OZ/A	PREEM	A	1 a	2 a	0 a	2 a	2 a
BALANCE	6	OZ/A	PREEM	A	1 a	2 a	0 a	2 a	2 a
LSD (P=.05)					1.9	1.5	0	1.5	2
CV					193.08	158.11	0	158.11	99.56

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					BRSOL	BRSOL	CPSAN	CPSAN	CPSAN
Part Rated					R.DYNA P	R.DYNA P	PALIDN P	PALIDN P	PALIDN P
Rating Data Type					CHLOROSIS	STUNT	INJURY	CHLOROSIS	STUNT
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/10/2002	6/10/2002	6/10/2002	6/10/2002	6/10/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	11	12	13	14	15
UNTREATED CONTROL					0 a	0 b	0 a	0 a	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 a	1 ab	0 a	0 a	0 a
BALANCE	2	OZ/A	PREEM	A	0 a	1 ab	0 a	0 a	0 a
BALANCE	3	OZ/A	PREEM	A	0 a	2 a	0 a	0 a	0 a
BALANCE	6	OZ/A	PREEM	A	0 a	2 a	0 a	0 a	0 a
LSD (P=.05)					0	2	0	0	0
CV					0	99.56	0	0	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					CPSAN	CPSAN	CPSAN	LYPES	LYPES
Part Rated					ARISTL P	ARISTL P	ARISTL P	PET696 P	PET696 P
Rating Data Type					INJURY	CHLOROSIS	STUNT	INJURY	CHLOROSIS
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/10/2002	6/10/2002	6/10/2002	6/10/2002	6/10/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	16	17	18	19	20
UNTREATED CONTROL					0 a	0 a	0 a	0 a	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 a	0 a	0 a	1 a	0 a
BALANCE	2	OZ/A	PREEM	A	0 a	0 a	0 a	1 a	0 a
BALANCE	3	OZ/A	PREEM	A	0 a	0 a	0 a	2 a	0 a
BALANCE	6	OZ/A	PREEM	A	0 a	0 a	0 a	2 a	0 a
LSD (P=.05)					0	0	0	1.5	0
CV					0	0	0	109.71	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					LYPES	LYPES	LYPES	LYPES	PHSVN
Part Rated					PET696 P	HZ9437 P	HZ9437 P	HZ9437 P	STRIKE P
Rating Data Type					STUNT	INJURY	CHLOROSIS	STUNT	INJURY
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/10/2002	6/10/2002	6/10/2002	6/10/2002	6/17/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	21	22	23	24	25
UNTREATED CONTROL					0 a	0 a	0 a	0 a	0 d
BALANCE	1.5	OZ/A	PREEM	A	1 a	1 a	0 a	1 a	6 cd
BALANCE	2	OZ/A	PREEM	A	1 a	1 a	0 a	1 a	17 bc
BALANCE	3	OZ/A	PREEM	A	2 a	2 a	0 a	2 a	29 b
BALANCE	6	OZ/A	PREEM	A	2 a	2 a	0 a	2 a	48 a
LSD (P=.05)					1.5	1.5	0	1.5	12.6
CV					109.71	109.71	0	109.71	41.08

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					PHSVN	PHSVN	PHSVN	PHSVN	PHSVN
Part Rated					STRIKE P	STRIKE P	HIALEA P	HIALEA P	HIALEA P
Rating Data Type					CHLOROSIS	STUNT	INJURY	CHLOROSIS	STUNT
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/17/2002	6/17/2002	6/17/2002	6/17/2002	6/17/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	26	27	28	29	30
UNTREATED CONTROL					0 d	0 d	0 d	0 c	0 d
BALANCE	1.5	OZ/A	PREEM	A	6 cd	5 cd	6 cd	6 bc	6 cd
BALANCE	2	OZ/A	PREEM	A	17 bc	16 bc	18 bc	18 ab	18 bc
BALANCE	3	OZ/A	PREEM	A	26 ab	29 b	29 b	29 a	29 b
BALANCE	6	OZ/A	PREEM	A	31 a	48 a	48 a	30 a	50 a
LSD (P=.05)					12.2	13	13.5	15.7	12.9
CV					49.18	43.35	43.72	61.79	40.99

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					BRSOL	BRSOL	BRSOL	BRSOL	BRSOL
Part Rated					HURON P	HURON P	HURON P	R.DYNA P	R.DYNA P
Rating Data Type					INJURY	CHLOROSIS	STUNT	INJURY	CHLOROSIS
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/17/2002	6/17/2002	6/17/2002	6/17/2002	6/17/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	31	32	33	34	35
UNTREATED CONTROL					0 a	0 a	0 a	0 a	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	2	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	3	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	6	OZ/A	PREEM	A	1 a	1 a	1 a	1 a	1 a
LSD (P=.05)					1.7	1.7	1.7	1.7	1.7
CV					447.21	447.21	447.21	447.21	447.21

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					BRSOL	CPSAN	CPSAN	CPSAN	CPSAN
Crop Code					R.DYNA P	PALIDN P	PALIDN P	PALIDN P	ARISTL P
Part Rated					STUNT	INJURY	CHLOROSIS	STUNT	INJURY
Rating Data Type					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Unit					6/17/2002	6/17/2002	6/17/2002	6/17/2002	6/17/2002
Rating Date									
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	36	37	38	39	40
UNTREATED CONTROL					0 a	0 a	0 a	0 a	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	2	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	3	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	6	OZ/A	PREEM	A	1 a	0 a	0 a	0 a	0 a
LSD (P=.05)					1.7	0	0	0	0
CV					447.21	0	0	0	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					CPSAN	CPSAN	LYPES	LYPES	LYPES
Part Rated					ARISTL P	ARISTL P	PET696 P	PET696 P	PET696 P
Rating Data Type					CHLOROSIS	STUNT	INJURY	CHLOROSIS	STUNT
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/17/2002	6/17/2002	6/17/2002	6/17/2002	6/17/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	41	42	43	44	45
UNTREATED CONTROL					0 a	0 a	0 a	0 a	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	2	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	3	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	6	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
LSD (P=.05)					0	0	0	0	0
CV					0	0	0	0	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					LYPES	LYPES	LYPES	PHSVN	PHSVN
Part Rated					HZ9437 P	HZ9437 P	HZ9437 P	STRIKE P	STRIKE P
Rating Data Type					INJURY	CHLOROSIS	STUNT	INJURY	CHLOROSIS
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/17/2002	6/17/2002	6/17/2002	6/24/2002	6/24/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	46	47	48	49	50
UNTREATED CONTROL					0 a	0 a	0 a	0 c	0 d
BALANCE	1.5	OZ/A	PREEM	A	0 a	0 a	0 a	40 b	33 c
BALANCE	2	OZ/A	PREEM	A	0 a	0 a	0 a	48 b	43 b
BALANCE	3	OZ/A	PREEM	A	0 a	0 a	0 a	86 a	58 a
BALANCE	6	OZ/A	PREEM	A	0 a	0 a	0 a	90 a	60 a
LSD (P=.05)					0	0	0	17.4	9.8
CV					0	0	0	21.41	16.6

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					PHSVN	PHSVN	PHSVN	PHSVN	BRSOL
Part Rated					STRIKE P	HIALEA P	HIALEA P	HIALEA P	HURON P
Rating Data Type					STUNT	INJURY	CHLOROSIS	STUNT	INJURY
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/24/2002	6/24/2002	6/24/2002	6/24/2002	6/24/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	51	52	53	54	55
UNTREATED CONTROL					0 c	0 c	0 d	0 c	0 b
BALANCE	1.5	OZ/A	PREEM	A	43 b	40 b	33 c	43 b	1 ab
BALANCE	2	OZ/A	PREEM	A	48 b	48 b	43 b	48 b	3 ab
BALANCE	3	OZ/A	PREEM	A	88 a	86 a	58 a	88 a	3 ab
BALANCE	6	OZ/A	PREEM	A	90 a	90 a	60 a	90 a	4 a
LSD (P=.05)					16.6	17.4	9.8	16.6	2.7
CV					20.12	21.41	16.6	20.12	88.39

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					BRSOL	BRSOL	BRSOL	BRSOL
Part Rated					HURON P	HURON P	R.DYNA P	R.DYNA P
Rating Data Type					CHLOROSIS	STUNT	INJURY	CHLOROSIS
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/24/2002	6/24/2002	6/24/2002	6/24/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	56	57	58	59
UNTREATED CONTROL					0 a	0 b	0 b	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 a	1 ab	1 ab	0 a
BALANCE	2	OZ/A	PREEM	A	0 a	3 ab	3 ab	0 a
BALANCE	3	OZ/A	PREEM	A	0 a	3 ab	3 ab	0 a
BALANCE	6	OZ/A	PREEM	A	1 a	4 a	4 a	0 a
LSD (P=.05)					1.7	2.7	2.7	0
CV					447.21	88.39	88.39	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					BRSOL	CPSAN	CPSAN	CPSAN
Crop Code					R.DYNA P	PALIDN P	PALIDN P	PALIDN P
Part Rated					STUNT	INJURY	CHLOROSIS	STUNT
Rating Data Type					PERCENT	PERCENT	PERCENT	PERCENT
Rating Unit					6/24/2002	6/24/2002	6/24/2002	6/24/2002
Rating Date								
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	60	61	62	63
UNTREATED CONTROL					0 b	0 c	0 b	0 c
BALANCE	1.5	OZ/A	PREEM	A	1 ab	1 bc	1 b	1 bc
BALANCE	2	OZ/A	PREEM	A	3 ab	4 b	4 ab	4 b
BALANCE	3	OZ/A	PREEM	A	3 ab	3 bc	3 b	3 bc
BALANCE	6	OZ/A	PREEM	A	4 a	9 a	8 a	9 a
LSD (P=.05)					2.7	3.1	4.2	3.1
CV					88.39	61.22	90.01	61.22

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					CPSAN	CPSAN	CPSAN	LYPES
Part Rated					ARISTL P	ARISTL P	ARISTL P	PET696 P
Rating Data Type					INJURY	CHLOROSIS	STUNT	INJURY
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/24/2002	6/24/2002	6/24/2002	6/24/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	64	65	66	67
UNTREATED CONTROL					0 c	0 c	0 c	0 a
BALANCE	1.5	OZ/A	PREEM	A	1 bc	1 bc	1 bc	1 a
BALANCE	2	OZ/A	PREEM	A	4 b	4 b	4 b	1 a
BALANCE	3	OZ/A	PREEM	A	3 bc	3 bc	3 bc	1 a
BALANCE	6	OZ/A	PREEM	A	9 a	9 a	9 a	3 a
LSD (P=.05)					3.1	3.1	3.1	2.7
CV					61.22	61.22	61.22	141.42

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					LYPES	LYPES	LYPES	LYPES
Part Rated					PET696 P	PET696 P	HZ9437 P	HZ9437 P
Rating Data Type					CHLOROSIS	STUNT	INJURY	CHLOROSIS
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/24/2002	6/24/2002	6/24/2002	6/24/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	68	69	70	71
UNTREATED CONTROL					0 a	0 a	0 c	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 a	1 a	1 bc	0 a
BALANCE	2	OZ/A	PREEM	A	0 a	1 a	3 abc	0 a
BALANCE	3	OZ/A	PREEM	A	0 a	1 a	4 ab	0 a
BALANCE	6	OZ/A	PREEM	A	0 a	3 a	5 a	0 a
LSD (P=.05)					0	2.7	3.1	0
CV					0	141.42	79.58	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					LYPES	PHSVN	PHSVN	PHSVN
Part Rated					HZ9437 P	STRIKE P	STRIKE P	STRIKE P
Rating Data Type					STUNT	INJURY	CHLOROSIS	STUNT
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/24/2002	7/1/2002	7/1/2002	7/1/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	72	73	74	75
UNTREATED CONTROL					0 c	0 c	0 c	0 c
BALANCE	1.5	OZ/A	PREEM	A	1 bc	79 b	80 b	79 b
BALANCE	2	OZ/A	PREEM	A	3 abc	96 a	96 a	96 a
BALANCE	3	OZ/A	PREEM	A	4 ab	99 a	100 a	99 a
BALANCE	6	OZ/A	PREEM	A	5 a	100 a	100 a	100 a
LSD (P=.05)					3.1	9.5	10.8	9.5
CV					79.58	8.3	9.31	8.3

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					PHSVN	PHSVN	PHSVN	BRSOL
Part Rated					HIALEA P	HIALEA P	HIALEA P	HURON P
Rating Data Type					INJURY	CHLOROSIS	STUNT	INJURY
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/1/2002	7/1/2002	7/1/2002	7/1/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	76	77	78	79
UNTREATED CONTROL					0 c	0 c	0 c	0 d
BALANCE	1.5	OZ/A	PREEM	A	79 b	80 b	79 b	3 cd
BALANCE	2	OZ/A	PREEM	A	96 a	96 a	96 a	8 bc
BALANCE	3	OZ/A	PREEM	A	99 a	99 a	99 a	10 ab
BALANCE	6	OZ/A	PREEM	A	100 a	100 a	100 a	16 a
LSD (P=.05)					9.5	10.5	9.5	6.7
CV					8.3	9.1	8.3	59.73

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					BRSOL	BRSOL	BRSOL	BRSOL
Part Rated					HURON P	HURON P	R.DYNA P	R.DYNA P
Rating Data Type					CHLOROSIS	STUNT	INJURY	CHLOROSIS
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/1/2002	7/1/2002	7/1/2002	7/1/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	80	81	82	83
UNTREATED CONTROL					0 a	0 d	0 c	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 a	3 cd	4 bc	0 a
BALANCE	2	OZ/A	PREEM	A	3 a	8 bc	8 bc	3 a
BALANCE	3	OZ/A	PREEM	A	0 a	10 ab	10 ab	0 a
BALANCE	6	OZ/A	PREEM	A	5 a	16 a	16 a	5 a
LSD (P=.05)					8	6.7	7.9	8
CV					344.27	59.73	68.58	344.27

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					BRSOL	CPSAN	CPSAN	CPSAN
Part Rated					R.DYNA P	PALIDN P	PALIDN P	PALIDN P
Rating Data Type					STUNT	INJURY	CHLOROSIS	STUNT
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/1/2002	7/1/2002	7/1/2002	7/1/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	84	85	86	87
UNTREATED CONTROL					0 c	0 b	0 c	0 c
BALANCE	1.5	OZ/A	PREEM	A	6 bc	0 b	3 c	3 c
BALANCE	2	OZ/A	PREEM	A	8 abc	4 b	9 b	9 b
BALANCE	3	OZ/A	PREEM	A	10 ab	7 ab	8 b	8 b
BALANCE	6	OZ/A	PREEM	A	15 a	11 a	16 a	16 a
LSD (P=.05)					8.6	7.1	4.2	4.2
CV					71.65	104.59	38.58	38.58

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					CPSAN	CPSAN	CPSAN	LYPES
Part Rated					ARISTL P	ARISTL P	ARISTL P	PET696 P
Rating Data Type					INJURY	CHLOROSIS	STUNT	CHLOROSIS
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/1/2002	7/1/2002	7/1/2002	7/1/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	88	89	90	91
UNTREATED CONTROL					0 b	0 c	0 c	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 b	3 c	3 c	0 a
BALANCE	2	OZ/A	PREEM	A	4 b	9 b	9 b	0 a
BALANCE	3	OZ/A	PREEM	A	7 ab	8 b	8 b	0 a
BALANCE	6	OZ/A	PREEM	A	11 a	16 a	16 a	0 a
LSD (P=.05)					7.1	4.2	4.2	0
CV					104.59	38.58	38.58	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					LYPES	LYPES	LYPES	LYPES
Part Rated					PET696 P	PET696 P	HZ9437 P	HZ9437 P
Rating Data Type					STUNT	INJURY	CHLOROSIS	STUNT
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/1/2002	7/1/2002	7/1/2002	7/1/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	92	93	94	95
UNTREATED CONTROL					0 c	0 c	0 a	0 c
BALANCE	1.5	OZ/A	PREEM	A	1 bc	1 bc	0 a	1 bc
BALANCE	2	OZ/A	PREEM	A	5 b	5 b	0 a	5 b
BALANCE	3	OZ/A	PREEM	A	10 a	10 a	0 a	10 a
BALANCE	6	OZ/A	PREEM	A	14 a	14 a	0 a	14 a
LSD (P=.05)					3.9	3.9	0	3.9
CV					42.36	42.36	0	42.36

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					LYPES	PHSVN	PHSVN	PHSVN
Part Rated					HZ9437 P	STRIKE P	STRIKE P	STRIKE P
Rating Data Type					INJURY	INJURY	CHLOROSIS	STUNT
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/1/2002	7/22/2002	7/22/2002	7/22/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	96	97	98	99
UNTREATED CONTROL					0 c	0 c	0 c	0 c
BALANCE	1.5	OZ/A	PREEM	A	1 bc	45 b	45 b	45 b
BALANCE	2	OZ/A	PREEM	A	5 b	93 a	93 a	93 a
BALANCE	3	OZ/A	PREEM	A	10 a	100 a	100 a	100 a
BALANCE	6	OZ/A	PREEM	A	14 a	100 a	100 a	100 a
LSD (P=.05)					3.9	17.1	17.1	17.1
CV					42.36	16.45	16.45	16.45

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					PHSVN	PHSVN	PHSVN	BRSOL
Part Rated					HIALEA P	HIALEA P	HIALEA P	HURON P
Rating Data Type					INJURY	CHLOROSIS	STUNT	INJURY
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/22/2002	7/22/2002	7/22/2002	7/22/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	100	101	102	103
UNTREATED CONTROL					0 c	0 c	0 c	0 c
BALANCE	1.5	OZ/A	PREEM	A	45 b	45 b	45 b	3 c
BALANCE	2	OZ/A	PREEM	A	93 a	93 a	93 a	16 b
BALANCE	3	OZ/A	PREEM	A	100 a	100 a	100 a	20 ab
BALANCE	6	OZ/A	PREEM	A	100 a	100 a	100 a	24 a
LSD (P=.05)					17.1	17.1	17.1	5.9
CV					16.45	16.45	16.45	30.77

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					BRSOL	BRSOL	BRSOL	BRSOL
Part Rated					HURON P	HURON P	R.DYNA P	R.DYNA P
Rating Data Type					CHLOROSIS	STUNT	INJURY	CHLOROSIS
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/22/2002	7/22/2002	7/22/2002	7/22/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	104	105	106	107
UNTREATED CONTROL					0 a	0 c	0 c	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 a	3 c	3 c	0 a
BALANCE	2	OZ/A	PREEM	A	0 a	16 b	16 b	0 a
BALANCE	3	OZ/A	PREEM	A	0 a	20 ab	20 ab	0 a
BALANCE	6	OZ/A	PREEM	A	0 a	24 a	24 a	0 a
LSD (P=.05)					0	5.9	5.9	0
CV					0	30.77	30.77	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					BRSOL	CPSAN	CPSAN	CPSAN
Part Rated					R.DYNA P	PALIDN P	PALIDN P	PALIDN P
Rating Data Type					STUNT	CHLOROSIS	STUNT	INJURY
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/22/2002	7/22/2002	7/22/2002	7/22/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	108	109	110	111
UNTREATED CONTROL					0 c	0 d	0 a	0 d
BALANCE	1.5	OZ/A	PREEM	A	3 c	0 d	0 a	0 d
BALANCE	2	OZ/A	PREEM	A	16 b	5 c	0 a	5 c
BALANCE	3	OZ/A	PREEM	A	20 ab	11 b	0 a	11 b
BALANCE	6	OZ/A	PREEM	A	24 a	15 a	0 a	15 a
LSD (P=.05)					5.9	3.6	0	3.6
CV					30.77	37.24	0	37.24

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					CPSAN	CPSAN	CPSAN	LYPES
Part Rated					ARISTL P	ARISTL P	ARISTL P	PET696 P
Rating Data Type					CHLOROS	STUNT	INJURY	CHLOROS
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/22/2002	7/22/2002	7/22/2002	7/22/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	112	113	114	115
UNTREATED CONTROL					0 d	0 a	0 d	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 d	0 a	0 d	0 a
BALANCE	2	OZ/A	PREEM	A	5 c	1 a	5 c	1 a
BALANCE	3	OZ/A	PREEM	A	11 b	3 a	11 b	0 a
BALANCE	6	OZ/A	PREEM	A	15 a	4 a	15 a	0 a
LSD (P=.05)					3.6	5	3.6	1.7
CV					37.24	217.31	37.24	447.21

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					LYPES	LYPES	LYPES	LYPES
Part Rated					PET696 P	PET696 P	HZ9437 P	HZ9437 P
Rating Data Type					STUNT	INJURY	CHLOROS	STUNT
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/22/2002	7/22/2002	7/22/2002	7/22/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	116	117	118	119
UNTREATED CONTROL					0 c	0 c	0 a	0 c
BALANCE	1.5	OZ/A	PREEM	A	0 c	0 c	0 a	0 c
BALANCE	2	OZ/A	PREEM	A	6 b	6 b	0 a	6 b
BALANCE	3	OZ/A	PREEM	A	8 b	8 b	0 a	8 b
BALANCE	6	OZ/A	PREEM	A	13 a	13 a	0 a	13 a
LSD (P=.05)					5	5	0	5
CV					61.48	61.48	0	61.48

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					LYPES	CUMSA	CUMSA	CUMSA
Part Rated					HZ9437 P	VLASSE P	VLASSE P	VLASSE P
Rating Data Type					INJURY	CHLOROSIS	STUNT	INJURY
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/22/2002	7/22/2002	7/22/2002	7/22/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	120	121	122	123
UNTREATED CONTROL					0 c	0 a	0 c	0 c
BALANCE	1.5	OZ/A	PREEM	A	0 c	0 a	0 c	0 c
BALANCE	2	OZ/A	PREEM	A	6 b	0 a	3 c	3 c
BALANCE	3	OZ/A	PREEM	A	8 b	0 a	14 b	14 b
BALANCE	6	OZ/A	PREEM	A	13 a	0 a	24 a	24 a
LSD (P=.05)					5	0	5.1	5.1
CV					61.48	0	41.54	41.54

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	125	128
Weed Code						
Crop Code					PHSVN	PHSVN
Part Rated					STRIKE F	HIALEA F
Rating Data Type					MKTB.WT.	MKTB.WT.
Rating Unit					TONS/A.	TONS/A.
Rating Date						
UNTREATED CONTROL					4.7 a	6.2 a
BALANCE	1.5	OZ/A	PREEM	A	4.7 a	4.6 b
BALANCE	2	OZ/A	PREEM	A	1.8 b	0.8 c
BALANCE	3	OZ/A	PREEM	A	0.2 b	0.2 c
BALANCE	6	OZ/A	PREEM	A	0 b	0 c
LSD (P=.05)					2.16	1.15
CV					61.7	31.76

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					PHSVN	PHSVN	PHSVN	PHSVN	PHSVN
Part Rated					STRIKE P	STRIKE P	STRIKE P	HIALEA P	HIALEA P
Rating Data Type					INJURY	CHLOROSIS	STUNT	INJURY	CHLOROSIS
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/10/2002	6/10/2002	6/10/2002	6/10/2002	6/10/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	1	2	3	4	5
UNTREATED CONTROL					0 c	0 b	0 a	0 d	0 c
BALANCE	1.5	OZ/A	PREEM	A	0 c	0 b	0 a	1 cd	1 bc
BALANCE	2	OZ/A	PREEM	A	1 bc	0 b	1 a	2 c	1 bc
BALANCE	3	OZ/A	PREEM	A	2 ab	2 ab	1 a	3 b	2 b
BALANCE	6	OZ/A	PREEM	A	4 a	3 a	1 a	5 a	5 a
LSD (P=.05)					1.9	1.8	1.7	1.5	1.5
CV					96.03	123.06	197.09	46.28	56.42

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					PHSVN	BRSOL	BRSOL	BRSOL	BRSOL
Crop Code					HIALEA P	HURON P	HURON P	HURON P	R.DYNA P
Part Rated					STUNT	INJURY	CHLOROSIS	STUNT	INJURY
Rating Data Type					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Unit					6/10/2002	6/10/2002	6/10/2002	6/10/2002	6/10/2002
Rating Date									
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	6	7	8	9	10
UNTREATED CONTROL					0 a	0 b	0 a	0 b	0 b
BALANCE	1.5	OZ/A	PREEM	A	0 a	0 b	0 a	0 b	1 ab
BALANCE	2	OZ/A	PREEM	A	1 a	0 b	0 a	0 b	1 ab
BALANCE	3	OZ/A	PREEM	A	1 a	2 a	0 a	2 a	2 a
BALANCE	6	OZ/A	PREEM	A	1 a	2 a	0 a	2 a	2 a
LSD (P=.05)					1.9	1.5	0	1.5	2
CV					193.08	158.11	0	158.11	99.56

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code					BRSOL	BRSOL	CPSAN	CPSAN	CPSAN
Crop Code					R.DYNA P	R.DYNA P	PALIDN P	PALIDN P	PALIDN P
Part Rated					CHLOROSIS	STUNT	INJURY	CHLOROSIS	STUNT
Rating Data Type					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Unit					6/10/2002	6/10/2002	6/10/2002	6/10/2002	6/10/2002
Rating Date									
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	11	12	13	14	15
UNTREATED CONTROL					0 a	0 b	0 a	0 a	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 a	1 ab	0 a	0 a	0 a
BALANCE	2	OZ/A	PREEM	A	0 a	1 ab	0 a	0 a	0 a
BALANCE	3	OZ/A	PREEM	A	0 a	2 a	0 a	0 a	0 a
BALANCE	6	OZ/A	PREEM	A	0 a	2 a	0 a	0 a	0 a
LSD (P=.05)					0	2	0	0	0
CV					0	99.56	0	0	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					CPSAN	CPSAN	CPSAN	CPSAN	CPSAN
Part Rated					ARISTL P	ARISTL P	PALIDN F	PALIDN F	ARISTL F
Rating Data Type					INJURY	CHLOROSIS	MKTB.WT.	CULL WT.	MKTB.WT.
Rating Unit					PERCENT	PERCENT	TONS/A.	TONS/A.	TONS/A.
Rating Date					6/10/2002	6/10/2002			
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	16	17	131	133	135
UNTREATED CONTROL					0 a	0 a	16.1 ab	4.4 a	17.3 a
BALANCE	1.5	OZ/A	PREEM	A	0 a	0 a	21.9 a	5.3 a	18.3 a
BALANCE	2	OZ/A	PREEM	A	0 a	0 a	14 b	4.7 a	19.4 a
BALANCE	3	OZ/A	PREEM	A	0 a	0 a	16.7 ab	5.5 a	17.6 a
BALANCE	6	OZ/A	PREEM	A	0 a	0 a	13.7 b	4.2 a	13 a
LSD (P=.05)					0	0	7.6	2.59	8.34
CV					0	0	30.02	34.97	31.59

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					CPSAN	LYPES	LYPES	LYPES
Part Rated					ARISTL F	PET696 F	PET696 F	PET696 F
Rating Data Type					CULL WT.	MKTB.WT.	CULL WT.	GREEN WT.
Rating Unit					TONS/A.	TONS/A.	TONS/A.	TONS/A.
Rating Date								
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	137	139	141	143
UNTREATED CONTROL					3.4 a	31.1 b	0.9 b	8 a
BALANCE	1.5	OZ/A	PREEM	A	4.9 a	34 b	1.7 ab	7.4 a
BALANCE	2	OZ/A	PREEM	A	3.7 a	32.4 b	1.6 ab	6.8 a
BALANCE	3	OZ/A	PREEM	A	4.3 a	40.6 a	2 a	5.2 a
BALANCE	6	OZ/A	PREEM	A	3.4 a	34.1 b	1.1 b	5.6 a
LSD (P=.05)					1.75	5.37	0.92	2.99
CV					29.02	10.13	41.02	29.38

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					LYPES	LYPES	LYPES	CUMSA
Part Rated					HZ9437 F	HZ9437 F	HZ9437 F	VLASSE F
Rating Data Type					MKTB.WT.	CULL WT.	GREEN WT.	MKTB.WT.
Rating Unit					TONS/A.	TONS/A.	TONS/A.	TONS/A.
Rating Date								
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	145	147	149	151
UNTREATED CONTROL					30.6 ab	2.5 a	4.5 a	6.2 a
BALANCE	1.5	OZ/A	PREEM	A	33 a	2.9 a	5.1 a	9.2 a
BALANCE	2	OZ/A	PREEM	A	26 b	2.1 a	3.8 a	9.9 a
BALANCE	3	OZ/A	PREEM	A	28.2 ab	2.1 a	6.7 a	8.8 a
BALANCE	6	OZ/A	PREEM	A	31.5 ab	3.3 a	4 a	6.3 a
LSD (P=.05)					6.91	1.58	4.21	4.14
CV					15.01	39.85	56.79	33.26

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code								
Part Rated					CUMSA VLASSE F	CUMSA VLASSE F	BRSOL HURON F	BRSOL HURON F
Rating Data Type					CULL WT.	OVERSZ.WT.	MKTB.WT.	CULL WT.
Rating Unit					TONS/A.	TONS/A.	TONS/A.	TONS/A.
Rating Date							10/4/2002	10/4/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	153	155	157	159
UNTREATED CONTROL					0.5 a	3.5 a	19.4 b	24.3 a
BALANCE	1.5	OZ/A	PREEM	A	1.1 a	2.5 a	33 ab	16.5 a
BALANCE	2	OZ/A	PREEM	A	1 a	2.4 a	25.8 ab	24.8 a
BALANCE	3	OZ/A	PREEM	A	0.6 a	2.9 a	35.6 a	20.4 a
BALANCE	6	OZ/A	PREEM	A	1.1 a	1.3 a	22.2 ab	24.5 a
LSD (P=.05)					0.72	2.82	15.06	17.8
CV					55.69	73.17	35.93	52.26

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- FREMONT

Trial ID: BALCARRYFRE 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Fremont, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code						
Crop Code					BRSOL	BRSOL
Part Rated					R.DYNA F	R.DYNA F
Rating Data Type					MKTB.WT.	CULL WT.
Rating Unit					TONS/A.	TONS/A.
Rating Date					9/10/2002	9/10/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	161	163
UNTREATED CONTROL					1 b	18.9 a
BALANCE	1.5	OZ/A	PREEM	A	10.2 a	9.7 b
BALANCE	2	OZ/A	PREEM	A	8.3 ab	12.5 b
BALANCE	3	OZ/A	PREEM	A	11.8 a	11 b
BALANCE	6	OZ/A	PREEM	A	10.7 a	7.6 b
LSD (P=.05)					7.79	5.95
CV					60.42	32.4

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

COOPERATOR/LANDOWNER
Cooperator: John Elliot, Farm Mgr.
Org: OARDC,Dept.HCS Phone No: 330-263-3940
Address 1: 1628 Dover Road
City: Wooster
State/Prov: Ohio
Postal Code: 44691

Conducted Under GLP (Y/N): N Conducted Under GEP (Y/N): N

Objective: To evaluate sensitivity of vegetable crops to soil residues of "Balance" herbicide applied PRE on field corn the previous year.

Crop 1: PHSVN BEAN, SNAP Variety: STRIKE / HIALEAH
Planting Date: 05/24/02 Planting Method: DRILL
Rate: 80 LB/A Depth: 1 inches
Row Spacing: 3 FT. Seed Bed: CONVENTIONAL
Soil Moisture: MOIST Emergence Date: 05/01/02

Crop 2: DAUCS CARROT Variety: S.NANTES / DANVERS 126
Planting Date: 05/24/02 Planting Method: DRILL
Rate: 3 LB./A Depth: 0.5 inches
Row Spacing: 30 inches Seed Bed: CONVENTIONAL
Soil Moisture: MOIST

Crop 3: LYPES PROCESSING TOMATO Variety: PETO 696/ HEINZ 9437
Planting Date: 06/03/02 Planting Method: TRANSPLANTED
Rate: 12 inches Depth: 2 inches
Row Spacing: 6 FEET Seed Bed: CONVENTIONAL
Soil Moisture: MOIST

Crop 4: CPSAN BELL PEPPER Variety: ARISTOTLE / PALADIN
Planting Date: 06/03/02 Planting Method: TRANSPLANTED
Rate: 12 inches Depth: 2 inches
Row Spacing: 36 inches Seed Bed: CONVENTIONAL
Soil Moisture: MOIST

Crop 5: BRSOL CABBAGE Variety: RED DYNASTY / HURON
Planting Date: 06/03/02 Planting Method: TRANSPLANTED
Rate: 10 inches in Row Depth: 2 inches
Row Spacing: 3 FT Seed Bed: CONVENTIONAL
Soil Moisture: MOIST

Crop 6: CUMSA CUCUMBER/PICKLE Variety: DASHER 2 / VLASSET
Planting Date: 05/24/02 Planting Method: DRILL
Rate: 2 seeds/9 inches Depth: 1 inch
Row Spacing: 48 inches Seed Bed: CONVENTIONAL
Soil Moisture: MOIST

SITE AND DESIGN

Plot Width, Unit: 15 FT Plot Length, Unit: 50 FT Reps: 4
Site Type: WELL-DRAINED FIELD
Tillage Type: CONVENTIONAL Study Design: RANDOMIZED COMPLETE BLOCK

Trial Initiation Comments: In 2002 plots were established across 2001 plots.

MAINTENANCE

Field Prep./Maintenance: Plowed and disked field early May. Fertilized all transplants with 10-34-0 liquid fertilizer. Applied fungicides and insecticides throughout growing season as recommended for the various vegetable crops in the "Ohio Vegetable Production Guide," 2002 edition.

SOIL DESCRIPTION

% Sand: 11 % OM: 3 Texture: SILT LOAM
% Silt: 75 pH: 6.0 Soil Name: WOOSTER SILT LOAM
% Clay: 14 CEC: 13 Fert. Level: MODERATE

APPLICATION DESCRIPTION

	A
Application Date:	5/25/2001
Time of Day:	11-12AM
Application Method:	SPRAY
Application Timing:	PREEM
Applic. Placement:	BDCST.
Air Temp., Unit:	13.5 C
% Relative Humidity:	99
Wind Velocity, Unit:	3 MPH
Soil Moisture:	MED
% Cloud Cover:	50

CROP STAGE AT EACH APPLICATION

	A
Crop 1 Code, Stage:	PHSVN
Crop 2 Code, Stage:	DAUCS
Crop 3 Code, Stage:	LYPES
Crop 4 Code, Stage:	CPSAN
Crop 5 Code, Stage:	BRSOL

APPLICATION EQUIPMENT

	A
Appl. Equipment:	CO2 PLOT
Operating Pressure:	35 PSI
Nozzle Type:	FLAT FAN
Nozzle Size:	8002VS
Nozzle Spacing, Unit:	12 IN.
Nozzles/Row:	10
Band Width, Unit:	10 FT.
Boom Height, Unit:	18 IN.
Ground Speed, Unit:	3.5 MPH
Carrier:	H2O
Spray Volume, Unit:	25 GPA
Propellant:	CO2

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Trial Comments

For the 2002 Balance carryover trial in Wooster, we planted six main crops, with two varieties per crop. They were:

CROP	VARIETY
1) Snap bean:	Strike & Hialeah
2) Tomato:	Heinz 9436 & Peto 696
3) Pepper:	Paladin & Aristotle
4) Cabbage:	Red Dynasty & Huron
5) Carrot:	Scarlet Nantes & Danvers 126
6) Cucumber:	Dasher II & Vlasset

Under "PART RATED" in the data section, the specfic crop cultivar is given first, followed by one of the following letter codes:
P= PLANT; F= FRUIT; R= ROOT; H= HEAD.

Snap beans,cucumbers, and carrots were direct-seeded on May 24. Transplants were used with the remaining crops on June 3. The crops were observed regularly, and were rated for chlorosis (yellowing), stunting, and total injury. Ratings were taken on a percentage basis, where ("0" = no injury, and "100" = plant death). There was no visual injury to any of the crops prior to June 25. Plant counts and yields were based on four linear feet of row. Plot yields were taken in kilograms, and have been converted to tons per acre. The cultivar names are listed in the data section heading under "PART RATED"; the complete names are listed above. Below are abbreviations found in the data and an explanation for them:
COUNT= number of plants in four linear feet of row.
CULL NO.= cull number, (cull being diseased, inferior quality, or otherwise non-marketable)
CULL WT.= cull weight
MSSHAPE. NO. = Misshapen number
MSSHAPE. WT.= misshapen weight
MKTB. NO.= marketable number
MKTB. WT.= marketable weight
50 FRT. WT. = weight of 50 marketable fruit (tomatoes)
For carrots, "marketables" were six or more inches in length; for cucumbers, all fruits that are thumb size to 2" diameter; for cabbage, 4" or greater head diameter.

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					PHSVN	PHSVN	PHSVN	PHSVN	PHSVN
Part Rated					STRIKE P	STRIKE P	STRIKE P	HIALEA P	HIALEA P
Rating Data Type					INJURY	CHLOROSIS	STUNT	INJURY	CHLOROSIS
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/10/2002	6/10/2002	6/10/2002	6/10/2002	6/10/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	1	2	3	4	5
UNTREATED CONTROL					0 a	0 a	0 a	0 a	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	2	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	3	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	6	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
LSD (P=.05)					0	0	0	0	0
CV					0	0	0	0	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					PHSVN	BRSOL	BRSOL	BRSOL	BRSOL
Part Rated					HIALEA P	HURON P	HURON P	HURON P	R.DYNA P
Rating Data Type					STUNT	INJURY	CHLOROSIS	STUNT	INJURY
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/10/2002	6/10/2002	6/10/2002	6/10/2002	6/10/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	6	7	8	9	10
UNTREATED CONTROL					0 a	0 a	0 a	0 a	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	2	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	3	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	6	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
LSD (P=.05)					0	0	0	0	0
CV					0	0	0	0	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					BRSOL	BRSOL	DAUCS	DAUCS	DAUCS
Part Rated					R.DYNA P	R.DYNA P	S.NANT P	S.NANT P	S.NANT P
Rating Data Type					CHLOROSIS	STUNT	INJURY	CHLOROSIS	STUNT
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/10/2002	6/10/2002	6/10/2002	6/10/2002	6/10/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	11	12	13	14	15
UNTREATED CONTROL					0 a	0 a	0 a	0 a	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	2	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	3	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	6	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
LSD (P=.05)					0	0	0	0	0
CV					0	0	0	0	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					DAUCS	DAUCS	DAUCS	CPSAN	CPSAN
Part Rated					DV.126 P	DV.126 P	DV.126 P	PALADN P	PALADN P
Rating Data Type					INJURY	CHLOROSIS	STUNT	INJURY	CHLOROSIS
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/10/2002	6/10/2002	6/10/2002	6/10/2002	6/10/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	16	17	18	19	20
UNTREATED CONTROL					0 a	0 a	0 a	0 a	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	2	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	3	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	6	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
LSD (P=.05)					0	0	0	0	0
CV					0	0	0	0	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					CPSAN	CPSAN	CPSAN	CPSAN	LYPES
Part Rated					PALADN P	ARISTL P	ARISTL P	ARISTL P	PET696 P
Rating Data Type					STUNT	INJURY	CHLOROSIS	STUNT	STUNT
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/10/2002	6/10/2002	6/10/2002	6/10/2002	6/10/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	21	22	23	24	25
UNTREATED CONTROL					0 a	0 a	0 a	0 a	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	2	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	3	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	6	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
LSD (P=.05)					0	0	0	0	0
CV					0	0	0	0	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					LYPES	LYPES	LYPES	LYPES	LYPES
Part Rated					PET696 P	PET696 P	HZ9437 P	HZ9437 P	HZ9437 P
Rating Data Type					STUNT	STUNT	STUNT	STUNT	STUNT
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/10/2002	6/10/2002	6/10/2002	6/10/2002	6/10/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	26	27	28	29	30
UNTREATED CONTROL					0 a	0 a	0 a	0 a	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	2	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	3	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	6	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
LSD (P=.05)					0	0	0	0	0
CV					0	0	0	0	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					PHSVN	PHSVN	PHSVN	PHSVN	PHSVN
Part Rated					STRIKE P	STRIKE P	STRIKE P	HIALEA P	HIALEA P
Rating Data Type					INJURY	CHLOROSIS	STUNT	INJURY	CHLOROSIS
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/17/2002	6/17/2002	6/17/2002	6/17/2002	6/17/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	31	32	33	34	35
UNTREATED CONTROL					0 a	0 a	0 a	0 a	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	2	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	3	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	6	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
LSD (P=.05)					0	0	0	0	0
CV					0	0	0	0	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					PHSVN	BRSOL	BRSOL	BRSOL	BRSOL
Part Rated					HIALEA P	HURON P	HURON P	HURON P	R.DYNA P
Rating Data Type					STUNT	INJURY	CHLOROSIS	STUNT	INJURY
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/17/2002	6/17/2002	6/17/2002	6/17/2002	6/17/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	36	37	38	39	40
UNTREATED CONTROL					0 a	0 a	0 a	0 a	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	2	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	3	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	6	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
LSD (P=.05)					0	0	0	0	0
CV					0	0	0	0	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					BRSOL	BRSOL	DAUCS	DAUCS	DAUCS
Part Rated					R.DYNA P	R.DYNA P	S.NANT P	S.NANT P	S.NANT P
Rating Data Type					CHLOROSIS	STUNT	INJURY	CHLOROSIS	STUNT
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/17/2002	6/17/2002	6/17/2002	6/17/2002	6/17/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	41	42	43	44	45
UNTREATED CONTROL					0 a	0 a	0 a	0 a	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	2	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	3	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	6	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
LSD (P=.05)					0	0	0	0	0
CV					0	0	0	0	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					DAUCS	DAUCS	DAUCS	CPSAN	CPSAN
Part Rated					DV.126 P	DV.126 P	DV.126 P	PALADN P	PALADN P
Rating Data Type					INJURY	CHLOROSIS	STUNT	INJURY	CHLOROSIS
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/17/2002	6/17/2002	6/17/2002	6/17/2002	6/17/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	46	47	48	49	50
UNTREATED CONTROL					0 a	0 a	0 a	0 a	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	2	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	3	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	6	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
LSD (P=.05)					0	0	0	0	0
CV					0	0	0	0	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					CPSAN	CPSAN	CPSAN	CPSAN	LYPES
Part Rated					PALADN P	ARISTL P	ARISTL P	ARISTL P	PET696 P
Rating Data Type					STUNT	INJURY	CHLOROSIS	STUNT	STUNT
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/17/2002	6/17/2002	6/17/2002	6/17/2002	6/17/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	51	52	53	54	55
UNTREATED CONTROL					0 a	0 a	0 a	0 a	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	2	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	3	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	6	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
LSD (P=.05)					0	0	0	0	0
CV					0	0	0	0	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	56	57	58	59	60
Weed Code									
Crop Code					LYPES	LYPES	LYPES	LYPES	LYPES
Part Rated					PET696 P	PET696 P	HZ9437 P	HZ9437 P	HZ9437 P
Rating Data Type					STUNT	STUNT	STUNT	STUNT	STUNT
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/17/2002	6/17/2002	6/17/2002	6/17/2002	6/17/2002
UNTREATED CONTROL					0 a	0 a	0 a	0 a	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	2	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	3	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	6	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
LSD (P=.05)					0	0	0	0	0
CV					0	0	0	0	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					PHSVN	PHSVN	PHSVN	PHSVN
Part Rated					STRIKE P	STRIKE P	STRIKE P	HIALEA P
Rating Data Type					INJURY	CHLOROSIS	STUNT	INJURY
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/25/2002	6/25/2002	6/25/2002	6/25/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	61	62	63	64
UNTREATED CONTROL					0 d	0 a	0 d	0 d
BALANCE	1.5	OZ/A	PREEM	A	1 cd	0 a	1 cd	1 cd
BALANCE	2	OZ/A	PREEM	A	4 bc	0 a	4 bc	4 bc
BALANCE	3	OZ/A	PREEM	A	5 ab	0 a	5 ab	5 ab
BALANCE	6	OZ/A	PREEM	A	8 a	0 a	8 a	8 a
LSD (P=.05)					2.7	0	2.7	2.7
CV					50.51	0	50.51	50.51

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					PHSVN	PHSVN	BRSOL	BRSOL	BRSOL
Part Rated					HIALEA P	HIALEA P	HURON P	HURON P	HURON P
Rating Data Type					CHLOROSIS	STUNT	INJURY	CHLOROSIS	STUNT
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/25/2002	6/25/2002	6/25/2002	6/25/2002	6/25/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	65	66	67	68	69
UNTREATED CONTROL					0 a	0 d	0 c	0 a	0 c
BALANCE	1.5	OZ/A	PREEM	A	0 a	1 cd	0 c	0 a	0 c
BALANCE	2	OZ/A	PREEM	A	0 a	4 bc	4 b	0 a	4 b
BALANCE	3	OZ/A	PREEM	A	0 a	5 ab	5 ab	0 a	5 ab
BALANCE	6	OZ/A	PREEM	A	0 a	8 a	8 a	0 a	8 a
LSD (P=.05)					0	2.7	2.8	0	2.8
CV					0	50.51	56.18	0	56.18

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code							
Crop Code					BRSOL	BRSOL	BRSOL
Part Rated					R.DYNA P	R.DYNA P	R.DYNA P
Rating Data Type					INJURY	CHLOROSIS	STUNT
Rating Unit					PERCENT	PERCENT	PERCENT
Rating Date					6/25/2002	6/25/2002	6/25/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	70	71	72
UNTREATED CONTROL					0 c	0 a	0 c
BALANCE	1.5	OZ/A	PREEM	A	0 c	0 a	0 c
BALANCE	2	OZ/A	PREEM	A	4 b	0 a	4 b
BALANCE	3	OZ/A	PREEM	A	5 ab	0 a	5 ab
BALANCE	6	OZ/A	PREEM	A	8 a	0 a	8 a
LSD (P=.05)					2.8	0	2.8
CV					56.18	0	56.18

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					DAUCS	DAUCS	DAUCS	DAUCS	DAUCS
Part Rated					S.NANT P	S.NANT P	S.NANT P	DV.126 P	DV.126 P
Rating Data Type					INJURY	CHLOROSIS	STUNT	INJURY	CHLOROSIS
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/25/2002	6/25/2002	6/25/2002	6/25/2002	6/25/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	73	74	75	76	77
UNTREATED CONTROL					0 a	0 a	0 a	0 a	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	2	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	3	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	6	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
LSD (P=.05)					0	0	0	0	0
CV					0	0	0	0	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					DAUCS	CPSAN	CPSAN	CPSAN	CPSAN
Part Rated					DV.126 P	PALADN P	PALADN P	PALADN P	ARISTL P
Rating Data Type					STUNT	INJURY	CHLOROSIS	STUNT	INJURY
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/25/2002	6/25/2002	6/25/2002	6/25/2002	6/25/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	78	79	80	81	82
UNTREATED CONTROL					0 a	0 b	0 b	0 b	0 b
BALANCE	1.5	OZ/A	PREEM	A	0 a	0 b	0 b	0 b	0 b
BALANCE	2	OZ/A	PREEM	A	0 a	1 b	1 b	1 b	1 b
BALANCE	3	OZ/A	PREEM	A	0 a	0 b	0 b	0 b	0 b
BALANCE	6	OZ/A	PREEM	A	0 a	4 a	4 a	4 a	4 a
LSD (P=.05)					0	2.3	2.3	2.3	2.3
CV					0	151.38	151.38	151.38	151.38

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					CPSAN	CPSAN	LYPES	LYPES	LYPES
Part Rated					ARISTL P	ARISTL P	PET696 P	PET696 P	PET696 P
Rating Data Type					CHLOROSIS	STUNT	STUNT	INJURY	CHLOROSIS
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/25/2002	6/25/2002	6/25/2002	6/25/2002	6/25/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	83	84	85	86	87
UNTREATED CONTROL					0 b	0 b	0 b	0 b	0 b
BALANCE	1.5	OZ/A	PREEM	A	0 b	0 b	0 b	0 b	0 b
BALANCE	2	OZ/A	PREEM	A	1 b	1 b	3 ab	3 ab	3 ab
BALANCE	3	OZ/A	PREEM	A	0 b	0 b	4 a	4 a	4 a
BALANCE	6	OZ/A	PREEM	A	4 a	4 a	5 a	5 a	5 a
LSD (P=.05)					2.3	2.3	3.1	3.1	3.1
CV					151.38	151.38	90.72	90.72	90.72

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					LYPES	LYPES	LYPES	PHSVN
Part Rated					HZ9437 P	HZ9437 P	HZ9437 P	STRIKE P
Rating Data Type					STUNT	INJURY	CHLOROSIS	INJURY
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					6/25/2002	6/25/2002	6/25/2002	7/2/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	88	89	90	91
UNTREATED CONTROL					0 b	0 b	0 b	0 c
BALANCE	1.5	OZ/A	PREEM	A	0 b	0 b	0 b	0 c
BALANCE	2	OZ/A	PREEM	A	3 ab	3 ab	3 ab	4 bc
BALANCE	3	OZ/A	PREEM	A	4 a	4 a	4 a	9 ab
BALANCE	6	OZ/A	PREEM	A	5 a	5 a	5 a	11 a
LSD (P=.05)					3.1	3.1	3.1	5.5
CV					90.72	90.72	90.72	75.05

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					PHSVN	PHSVN	PHSVN	PHSVN	PHSVN
Part Rated					STRIKE P	STRIKE P	HIALEA P	HIALEA P	HIALEA P
Rating Data Type					CHLOROSIS	STUNT	INJURY	CHLOROSIS	STUNT
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/2/2002	7/2/2002	7/2/2002	7/2/2002	7/2/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	92	93	94	95	96
UNTREATED CONTROL					0 a	0 c	0 b	0 a	0 b
BALANCE	1.5	OZ/A	PREEM	A	0 a	0 c	1 b	0 a	1 b
BALANCE	2	OZ/A	PREEM	A	0 a	4 bc	4 ab	0 a	4 ab
BALANCE	3	OZ/A	PREEM	A	0 a	9 ab	4 ab	0 a	4 ab
BALANCE	6	OZ/A	PREEM	A	0 a	11 a	11 a	0 a	11 a
LSD (P=.05)					0	5.5	7.8	0	7.8
CV					0	75.05	126.04	0	126.04

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					BRSOL	BRSOL	BRSOL	BRSOL	BRSOL
Part Rated					HURON P	HURON P	HURON P	R.DYNA P	R.DYNA P
Rating Data Type					INJURY	CHLOROSIS	STUNT	INJURY	CHLOROSIS
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/2/2002	7/2/2002	7/2/2002	7/2/2002	7/2/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	97	98	99	100	101
UNTREATED CONTROL					0 b	0 a	0 b	0 b	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 b	0 a	0 b	0 b	0 a
BALANCE	2	OZ/A	PREEM	A	4 ab	0 a	4 ab	4 ab	0 a
BALANCE	3	OZ/A	PREEM	A	6 a	0 a	6 a	6 a	0 a
BALANCE	6	OZ/A	PREEM	A	8 a	0 a	8 a	8 a	0 a
LSD (P=.05)					5.2	0	5.2	5.2	0
CV					96.71	0	96.71	96.71	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					BRSOL	DAUCS	DAUCS	DAUCS	DAUCS
Part Rated					R.DYNA P	S.NANT P	S.NANT P	S.NANT P	DV.126 P
Rating Data Type					STUNT	INJURY	CHLOROSIS	STUNT	INJURY
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/2/2002	7/2/2002	7/2/2002	7/2/2002	7/2/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	102	103	104	105	106
UNTREATED CONTROL					0 b	0 a	0 a	0 a	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 b	0 a	0 a	0 a	0 a
BALANCE	2	OZ/A	PREEM	A	4 ab	0 a	0 a	0 a	0 a
BALANCE	3	OZ/A	PREEM	A	6 a	0 a	0 a	0 a	0 a
BALANCE	6	OZ/A	PREEM	A	8 a	0 a	0 a	0 a	0 a
LSD (P=.05)					5.2	0	0	0	0
CV					96.71	0	0	0	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					DAUCS	DAUCS	CPSAN	CPSAN	CPSAN
Part Rated					DV.126 P	DV.126 P	PALADN P	PALADN P	PALADN P
Rating Data Type					CHLOROSIS	STUNT	INJURY	CHLOROSIS	STUNT
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/2/2002	7/2/2002	7/2/2002	7/2/2002	7/2/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	107	108	109	110	111
UNTREATED CONTROL					0 a	0 a	3 ab	0 a	3 ab
BALANCE	1.5	OZ/A	PREEM	A	0 a	0 a	0 b	0 a	0 b
BALANCE	2	OZ/A	PREEM	A	0 a	0 a	1 b	0 a	1 b
BALANCE	3	OZ/A	PREEM	A	0 a	0 a	4 ab	0 a	4 ab
BALANCE	6	OZ/A	PREEM	A	0 a	0 a	6 a	0 a	6 a
LSD (P=.05)					0	0	4.4	0	4.4
CV					0	0	103.65	0	103.65

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					CPSAN	CPSAN	CPSAN	LYPES	LYPES
Part Rated					ARISTL P	ARISTL P	ARISTL P	PET696 P	PET696 P
Rating Data Type					INJURY	CHLOROSIS	STUNT	STUNT	INJURY
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/2/2002	7/2/2002	7/2/2002	7/2/2002	7/2/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	112	113	114	115	116
UNTREATED CONTROL					3 ab	0 a	3 ab	0 b	0 b
BALANCE	1.5	OZ/A	PREEM	A	0 b	0 a	0 b	0 b	0 b
BALANCE	2	OZ/A	PREEM	A	1 b	0 a	1 b	3 b	3 b
BALANCE	3	OZ/A	PREEM	A	4 ab	0 a	4 ab	3 b	3 b
BALANCE	6	OZ/A	PREEM	A	6 a	0 a	6 a	18 a	18 a
LSD (P=.05)					4.4	0	4.4	4.7	4.7
CV					103.65	0	103.65	67.28	67.28

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					LYPES	LYPES	LYPES	LYPES	PHSVN
Part Rated					PET696 P	HZ9437 P	HZ9437 P	HZ9437 P	STRIKE P
Rating Data Type					CHLOROSIS	STUNT	INJURY	CHLOROSIS	INJURY
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/2/2002	7/2/2002	7/2/2002	7/2/2002	7/17/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	117	118	119	120	121
UNTREATED CONTROL					0 a	0 b	0 b	0 a	0 c
BALANCE	1.5	OZ/A	PREEM	A	0 a	0 b	0 b	0 a	0 c
BALANCE	2	OZ/A	PREEM	A	0 a	3 b	3 b	0 a	4 bc
BALANCE	3	OZ/A	PREEM	A	0 a	3 b	3 b	0 a	9 ab
BALANCE	6	OZ/A	PREEM	A	0 a	18 a	18 a	0 a	11 a
LSD (P=.05)					0	4.7	4.7	0	5.5
CV					0	67.28	67.28	0	75.05

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					PHSVN	PHSVN	PHSVN	PHSVN
Part Rated					STRIKE P	STRIKE P	HIALEA P	HIALEA P
Rating Data Type					CHLOROSIS	STUNT	INJURY	CHLOROSIS
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/17/2002	7/17/2002	7/17/2002	7/17/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	122	123	124	125
UNTREATED CONTROL					0 a	0 c	0 b	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 a	0 c	1 b	0 a
BALANCE	2	OZ/A	PREEM	A	0 a	4 bc	4 ab	0 a
BALANCE	3	OZ/A	PREEM	A	0 a	9 ab	4 ab	0 a
BALANCE	6	OZ/A	PREEM	A	0 a	11 a	11 a	0 a
LSD (P=.05)					0	5.5	7.8	0
CV					0	75.05	126.04	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					PHSVN	BRSOL	BRSOL	BRSOL	BRSOL
Part Rated					HIALEA P	HURON P	HURON P	HURON P	R.DYNA P
Rating Data Type					STUNT	INJURY	CHLOROSIS	STUNT	INJURY
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/17/2002	7/17/2002	7/17/2002	7/17/2002	7/17/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	126	127	128	129	130
UNTREATED CONTROL					0 b	0 b	0 a	0 b	0 b
BALANCE	1.5	OZ/A	PREEM	A	1 b	0 b	0 a	0 b	0 b
BALANCE	2	OZ/A	PREEM	A	4 ab	4 ab	0 a	4 ab	4 ab
BALANCE	3	OZ/A	PREEM	A	4 ab	6 a	0 a	6 a	6 a
BALANCE	6	OZ/A	PREEM	A	11 a	8 a	0 a	8 a	8 a
LSD (P=.05)					7.8	5.2	0	5.2	5.2
CV					126.04	96.71	0	96.71	96.71

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					BRSOL	BRSOL	DAUCS	DAUCS	DAUCS
Part Rated					R.DYNA P	R.DYNA P	S.NANT P	S.NANT P	S.NANT P
Rating Data Type					CHLOROSIS	STUNT	INJURY	CHLOROSIS	STUNT
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/17/2002	7/17/2002	7/17/2002	7/17/2002	7/17/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	131	132	133	134	135
UNTREATED CONTROL					0 a	0 b	0 a	0 a	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 a	0 b	0 a	0 a	0 a
BALANCE	2	OZ/A	PREEM	A	0 a	4 ab	0 a	0 a	0 a
BALANCE	3	OZ/A	PREEM	A	0 a	6 a	0 a	0 a	0 a
BALANCE	6	OZ/A	PREEM	A	0 a	8 a	0 a	0 a	0 a
LSD (P=.05)					0	5.2	0	0	0
CV					0	96.71	0	0	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					DAUCS	DAUCS	DAUCS	CPSAN	CPSAN
Part Rated					DV.126 P	DV.126 P	DV.126 P	PALADN P	PALADN P
Rating Data Type					INJURY	CHLOROSIS	STUNT	INJURY	CHLOROSIS
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/17/2002	7/17/2002	7/17/2002	7/17/2002	7/17/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	136	137	138	139	140
UNTREATED CONTROL					0 a	0 a	0 a	0 b	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 a	0 a	0 a	0 b	0 a
BALANCE	2	OZ/A	PREEM	A	0 a	0 a	0 a	1 b	0 a
BALANCE	3	OZ/A	PREEM	A	0 a	0 a	0 a	4 ab	0 a
BALANCE	6	OZ/A	PREEM	A	0 a	0 a	1 a	6 a	0 a
LSD (P=.05)					0	0	1.7	3.8	0
CV					0	0	447.21	109.24	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					CPSAN	CPSAN	CPSAN	CPSAN
Part Rated					PALADN P	ARISTL P	ARISTL P	ARISTL P
Rating Data Type					STUNT	INJURY	CHLOROSIS	STUNT
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/17/2002	7/17/2002	7/17/2002	7/17/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	141	142	143	144
UNTREATED CONTROL					0 b	0 b	0 a	0 b
BALANCE	1.5	OZ/A	PREEM	A	0 b	0 b	0 a	0 b
BALANCE	2	OZ/A	PREEM	A	1 b	1 b	0 a	1 b
BALANCE	3	OZ/A	PREEM	A	4 ab	4 ab	0 a	4 ab
BALANCE	6	OZ/A	PREEM	A	6 a	6 a	0 a	6 a
LSD (P=.05)					3.8	3.8	0	3.8
CV					109.24	109.24	0	109.24

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					LYPES	LYPES	LYPES	LYPES	LYPES
Part Rated					PET696 P	PET696 P	PET696 P	HZ9437 P	HZ9437 P
Rating Data Type					STUNT	INJURY	CHLOROSIS	STUNT	INJURY
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/17/2002	7/17/2002	7/17/2002	7/17/2002	7/17/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	145	146	147	148	149
UNTREATED CONTROL					0 c	0 c	0 a	0 c	0 c
BALANCE	1.5	OZ/A	PREEM	A	0 c	0 c	0 a	0 c	0 c
BALANCE	2	OZ/A	PREEM	A	9 b	9 b	0 a	6 b	6 b
BALANCE	3	OZ/A	PREEM	A	10 b	10 b	0 a	8 b	8 b
BALANCE	6	OZ/A	PREEM	A	20 a	20 a	0 a	20 a	20 a
LSD (P=.05)					1.7	1.7	0	4.2	4.2
CV					14.43	14.43	0	40.57	40.57

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					LYPES	CUMSA	CUMSA	CUMSA	CUMSA
Part Rated					HZ9437 P	DASHR2 P	DASHR2 P	DASHR2 P	VLASST P
Rating Data Type					CHLOROSIS	STUNT	INJURY	CHLOROSIS	STUNT
Rating Unit					PERCENT	PERCENT	PERCENT	PERCENT	PERCENT
Rating Date					7/17/2002	7/17/2002	7/17/2002	7/17/2002	7/17/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	150	151	152	153	154
UNTREATED CONTROL					0 a	0 a	0 a	0 a	0 a
BALANCE	1.5	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	2	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	3	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
BALANCE	6	OZ/A	PREEM	A	0 a	0 a	0 a	0 a	0 a
LSD (P=.05)					0	0	0	0	0
CV					0	0	0	0	0

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code									
Part Rated					CUMSA VLASST P	CUMSA VLASST P	PHSVN STRIKE P	PHSVN STRIKE F	PHSVN HIALEA P
Rating Data Type					INJURY	CHLOROSIS	COUNT	MKTB.WT.	COUNT
Rating Unit					PERCENT	PERCENT	PER 4'	TONS/A.	PER 4'
Rating Date					7/17/2002	7/17/2002	7/24/2002	7/24/2002	7/24/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	155	156	157	159	160
UNTREATED CONTROL					0 a	0 a	13 a	15.5 a	16 a
BALANCE	1.5	OZ/A	PREEM	A	0 a	0 a	12 a	16.4 a	14 a
BALANCE	2	OZ/A	PREEM	A	0 a	0 a	12 a	15.6 a	17 a
BALANCE	3	OZ/A	PREEM	A	0 a	0 a	12 a	14.8 a	17 a
BALANCE	6	OZ/A	PREEM	A	0 a	0 a	14 a	14.3 a	16 a
LSD (P=.05)					0	0	4	4.48	6.1
CV					0	0	20.99	18.97	24.89

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					PHSVN	CPSAN	CPSAN	CPSAN	CPSAN
Part Rated					HIALEA F	PALADN F	PALADN F	PALADN F	PALADN F
Rating Data Type					MKTB.WT.	MKTB.NO.	MKTB.WT.	CULL NO.	CULL WT.
Rating Unit					TONS/A.	PER 4'	TONS/A.	PER 4'	TONS/A.
Rating Date					7/24/2002	7/24/2002	7/24/2002	7/24/2002	7/24/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	162	163	165	166	168
UNTREATED CONTROL					12.7 a	15 a	7.4 a	2 a	0.8 a
BALANCE	1.5	OZ/A	PREEM	A	11 a	14 a	6 a	4 a	1.8 a
BALANCE	2	OZ/A	PREEM	A	11.7 a	17 a	9.4 a	2 a	0.8 a
BALANCE	3	OZ/A	PREEM	A	11.2 a	17 a	8.1 a	2 a	0.7 a
BALANCE	6	OZ/A	PREEM	A	11.3 a	14 a	6.5 a	4 a	2.8 a
LSD (P=.05)					2.79	6.6	4.8	2	2.32
CV					15.66	28.06	41.57	53.35	109.66

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					CPSAN	CPSAN	CPSAN	CPSAN	CPSAN
Part Rated					PALADN P	ARISTL F	ARISTL F	ARISTL F	ARISTL F
Rating Data Type					AV.HEIGHT	MKTB.NO.	MKTB.WT.	CULL NO.	CULL WT.
Rating Unit					CM.	PER 4'	TONS/A.	PER 4'	TONS/A.
Rating Date					8/6/2002	7/24/2002	7/24/2002	7/24/2002	7/24/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	169	170	172	173	175
UNTREATED CONTROL					43.9 a	18 a	8.7 a	5 a	2.1 a
BALANCE	1.5	OZ/A	PREEM	A	50 a	15 a	6.8 a	7 a	2.6 a
BALANCE	2	OZ/A	PREEM	A	51.3 a	18 a	10 a	4 a	1.9 a
BALANCE	3	OZ/A	PREEM	A	50.8 a	18 a	9.3 a	6 a	2.8 a
BALANCE	6	OZ/A	PREEM	A	44.6 a	21 a	10.6 a	7 a	2.7 a
LSD (P=.05)					9.42	8.3	5.1	5.8	2.44
CV					12.7	29.98	36.48	65.54	65.64

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					CPSAN	CUMSA	CUMSA	CUMSA	CUMSA
Part Rated					ARISTL P	DASHR2 F	DASHR2 F	DASHR2 F	DASHR2 F
Rating Data Type					AV.HEIGHT	MKTB.NO.	MKTB.WT.	CULL NO.	CULL WT.
Rating Unit					CM.	PER 4'	TONS/A.	PER 4'	TONS/A.
Rating Date					8/6/2002	8/13/2002	8/13/2002	8/13/2002	8/13/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	176	177	179	180	182
UNTREATED CONTROL					47 a	36 a	18.4 a	26 ab	26 ab
BALANCE	1.5	OZ/A	PREEM	A	45.6 a	40 a	19.9 a	30 a	30.3 a
BALANCE	2	OZ/A	PREEM	A	45.2 a	28 a	13.9 a	20 ab	20.3 ab
BALANCE	3	OZ/A	PREEM	A	42.7 a	32 a	14.1 a	18 b	17.7 ab
BALANCE	6	OZ/A	PREEM	A	43.8 a	25 a	12.4 a	18 b	15.8 b
LSD (P=.05)					7.96	16.4	8.59	10.6	12.91
CV					11.52	33.14	35.45	30.99	38.07

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					CUMSA	CUMSA	CUMSA	CUMSA
Part Rated					DASHR2 F	DASHR2 F	VLASST F	VLASST F
Rating Data Type					MSSHAPE WT.	MSSHAPE NO.	MKTBL.NO.	MKTB.WT.
Rating Unit					TONS/A.	PER 4'	PER 4'	TONS/A.
Rating Date					8/13/2002	8/13/2002	8/13/2002	8/13/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	184	185	186	188
UNTREATED CONTROL					1.5 a	5 a	23 b	7.9 a
BALANCE	1.5	OZ/A	PREEM	A	1.8 a	6 a	24 ab	7.8 a
BALANCE	2	OZ/A	PREEM	A	1.3 a	4 a	31 ab	9.7 a
BALANCE	3	OZ/A	PREEM	A	1.2 a	4 a	33 a	11 a
BALANCE	6	OZ/A	PREEM	A	2.2 a	8 a	26 ab	9.4 a
LSD (P=.05)					1.66	4.9	9.4	3.69
CV					66.53	62.9	22.49	26.12

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					CUMSA	CUMSA	CUMSA	CUMSA
Part Rated					VLASST F	VLASST F	VLASST F	VLASST F
Rating Data Type					CULL NO.	WT.CULL	MSSHAPE NO.	MSSHAPE WT.
Rating Unit					PER 4'	TONS/A.	PER 4'	TONS/A.
Rating Date					8/13/2002	8/13/2002	8/13/2002	8/13/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	189	191	192	194
UNTREATED CONTROL					23 a	18.2 a	1 a	0.2 a
BALANCE	1.5	OZ/A	PREEM	A	27 a	22.1 a	1 a	0.3 a
BALANCE	2	OZ/A	PREEM	A	23 a	19.5 a	3 a	0.7 a
BALANCE	3	OZ/A	PREEM	A	23 a	19.4 a	2 a	0.5 a
BALANCE	6	OZ/A	PREEM	A	19 a	16.3 a	2 a	0.3 a
LSD (P=.05)					9.5	8.53	2.9	0.86
CV					26.77	28.99	122.41	137.05

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					DAUCS	DAUCS	DAUCS	DAUCS	DAUCS
Part Rated					S.NANT R	S.NANT R	S.NANT R	S.NANT R	DV.126 R
Rating Data Type					MKTBL.NO.	MKTBL. WT.	CULL NO.	CULL.WT.	MKTBL.NO.
Rating Unit					PER 4'	TONS/A.	PER 4'	TONS/A.	PER 4'
Rating Date					9/10/2002	9/10/2002	9/10/2002	9/10/2002	9/10/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	195	197	198	200	201
UNTREATED CONTROL					13 a	7.9 ab	81 a	13.8 a	4 b
BALANCE	1.5	OZ/A	PREEM	A	15 a	8 ab	69 a	11.9 a	10 ab
BALANCE	2	OZ/A	PREEM	A	10 a	5 b	81 a	12 a	8 ab
BALANCE	3	OZ/A	PREEM	A	12 a	10.3 a	61 a	10.5 a	10 ab
BALANCE	6	OZ/A	PREEM	A	12 a	7.3 ab	76 a	11.3 a	15 a
LSD (P=.05)					6.3	4.7	64.1	4.44	6.8
CV					33.48	39.62	56.62	24.22	48.11

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code								
Crop Code					DAUCS	DAUCS	DAUCS	LYPES
Part Rated					DV.126 R	DV.126 R	DV.126 R	PET696 F
Rating Data Type					MKTBL. WT.	CULL NO.	CULL WT.	50 FRT WT
Rating Unit					TONS/A.	PER 4'	TONS/A.	KG./4'
Rating Date					9/10/2002	9/10/2002	9/10/2002	9/16/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	203	204	206	207
UNTREATED CONTROL					5 a	30 a	9.7 ab	2.9 a
BALANCE	1.5	OZ/A	PREEM	A	8.2 a	58 a	10.8 ab	2.8 a
BALANCE	2	OZ/A	PREEM	A	6.5 a	48 a	8.7 b	2.6 a
BALANCE	3	OZ/A	PREEM	A	8.9 a	46 a	12.5 a	3 a
BALANCE	6	OZ/A	PREEM	A	10.2 a	50 a	9.2 ab	2.8 a
LSD (P=.05)					5.35	33.9	3.69	0.36
CV					44.76	47.53	23.54	8.36

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					LYPES	LYPES	LYPES	LYPES	LYPES
Part Rated					PET696 F	PET696 F	PET696 F	HZ9437 F	HZ9437 F
Rating Data Type					MTBLE WT	GREEN WT.	CULL WT.	50 FRT WT	MTBLE WT
Rating Unit					TONS/A.	TONS/A.	TONS/A.	KG./4'	TONS/A.
Rating Date					9/16/2002	9/16/2002	9/16/2002	9/16/2002	9/16/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	209	211	213	214	216
UNTREATED CONTROL					38 a	8.3 a	4.8 a	3 a	37.9 a
BALANCE	1.5	OZ/A	PREEM	A	41.6 a	7.9 a	5.5 a	2.7 a	30 b
BALANCE	2	OZ/A	PREEM	A	32.4 a	6.9 a	4.3 a	2.8 a	31.8 ab
BALANCE	3	OZ/A	PREEM	A	32 a	5.5 a	5.5 a	2.7 a	29.1 b
BALANCE	6	OZ/A	PREEM	A	38 a	7.2 a	5.2 a	3.1 a	29.7 b
LSD (P=.05)					10.05	3.76	2.49	0.65	6.84
CV					17.93	34.05	32.12	14.82	14.01

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code									
Crop Code					LYPES	LYPES	BRSOL	BRSOL	BRSOL
Part Rated					HZ9437 F	HZ9437 F	HEAD	HURON F	HURON F
Rating Data Type					GREEN WT.	CULL WT.	TOTAL NO.	AVE.WIDTH	TOTAL WT.
Rating Unit					TONS/A.	TONS/A.	PER 4'	CM.	TONS/A.
Rating Date					9/16/2002	9/16/2002	9/6/2002	9/6/2002	9/6/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	218	220	221	222	224
UNTREATED CONTROL					5.6 a	5.4 a	5 a	12.9 a	32.2 a
BALANCE	1.5	OZ/A	PREEM	A	6.3 a	5.8 a	4 a	13.1 a	27.6 a
BALANCE	2	OZ/A	PREEM	A	6.6 a	4.8 a	4 a	13.3 a	31.7 a
BALANCE	3	OZ/A	PREEM	A	5.9 a	6.1 a	5 a	13.4 a	36.6 a
BALANCE	6	OZ/A	PREEM	A	6.7 a	4.5 a	5 a	12.5 a	28.1 a
LSD (P=.05)					4.12	1.95	1	1.79	10.41
CV					43.07	23.82	14.82	8.88	21.63

Means followed by same letter do not significantly differ (P=.05, LSD)

The Ohio State University

SENSITIVITY OF VEGETABLE CROPS TO BALANCE SOIL RESIDUES- WOOSTER

Trial ID: BALCARRYW 2002 Study Dir.: Dr. Douglas J. Doohan & J. Felix
Location: Wooster, Ohio Investigator: Dr. Douglas J. Doohan

Weed Code							
Crop Code					BRSOL	BRSOL	BRSOL
Part Rated					R.DYNA F	R.DYNA F	R.DYNA F
Rating Data Type					AVE.WIDTH	TOTAL NO.	TOTAL WT
Rating Unit					CM.	PER 4'	TONS/A.
Rating Date					9/6/2002	9/6/2002	9/6/2002
Treatment Name	Product Rate	Product Rate Unit	Grow Stg	Appl Code	225	226	228
UNTREATED CONTROL					11.5 a	5 a	29.8 a
BALANCE	1.5	OZ/A	PREEM	A	11.5 a	5 a	28.6 a
BALANCE	2	OZ/A	PREEM	A	11.9 a	5 a	33.2 a
BALANCE	3	OZ/A	PREEM	A	11.9 a	5 a	29.9 a
BALANCE	6	OZ/A	PREEM	A	11.5 a	5 a	27.1 a
LSD (P=.05)					1.35	0.8	13.31
CV					7.53	11.11	29.07

Means followed by same letter do not significantly differ (P=.05, LSD)